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NEVADA GHOST TOWNS AND MINING CAMPS by Stanley W. Paher. Covering all of Nevada's 17 counties, Paher has documented 575 mining camps, many of which have been erased from the earth. The book contains the greatest and most complete collection of historic photographs of Nevada ever published. This, coupled with his excellent writing and map, creates a book of lasting value. Large 9x11 format, 700 photographs, hardcover, 492 pages, \$15.00.

THE BAJA BOOK, A Complete Map-Guide to Today's Baja California by Tom Miller and Elmar Baxter. Waiting until the new transpeninsular highway opened, the authors have pooled their knowledge to give every minute detail on gas stations, campgrounds, beaches, trailer oarks, road conditions, boating, surfing, flying, fishing, beachcombing, in addition to a Baja Roadlog which has been broken into convenient two-mile segments. A tremendous package for every kind of recreationist. Paperback, 178 pages, illus., maps, \$7.95.

DICTIONARY OF PREHISTORIC INDIAN ARTIFACTS OF THE AMERICAN SOUTHWEST by Franklin Barnett. A highly informative book that both illustrates and describes Indian artifacts of the Southwest, it is a valuable guide for the person interested in archaeology and anthropology. Includes 250 major types of artifacts. Each item has a photo and definition. Paperback, 130 pages, beautifully illustrated, \$7.95.

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THE WIND LEAVES NO SHADOW by Ruth Laughlin. "La Tules," an acknowledged queen of the monte game in old Santa Fe, was acclaimed not only for her red hair, her silver slippers and diamond rings, but also for her dazzling wit, which made even losers at her monte carlo table smile as she raked in their silver. Miss Laughlin has combined the historians's skill and the novelist's gift to unravel the truth about this legendary lady in a historical romance that has proven popular for nearly two decades. Hardcover, 361 pages, \$4.95.

GHOSTS OF THE GLORY TRAIL by Nell Murbarger. A pioneer of the ghost town explorers and writers, Miss Murbarger's followers will be glad to know this book is once again in print. First published in 1956, it is now in its seventh edition. The fast-moving chronicle is a result of personal interviews of old-timers who are no longer here to tell their tales. Hardcover, illustrated, 291 pages, \$7.00.

GOLD RUSHES AND MINING CAMPS OF THE EARLY AMERICAN WEST by Vardis Fisher and Opal Laurel Holmes. Few are better prepared than Vardis Fisher to write of the gold rushes and mining camps of the West. He brings together all the men and women, all the fascinating ingredients, all the violent contrasts which go to make up one of the most enthralling chapters in American history. 300 illustrations from photographs. Large format, hardcover, boxed, 466 pages, highly recommended. \$17.95.

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Books on Death Valley

EXPLORING DEATH VALLEY by Ruth Kirk. Good photos and maps with time estimates from place to place and geology, natural history and human interest information included. Paperback, \$2.25.

A NATURALIST'S DEATH VALLEY by Dr. Edmund C. Jaeger. In this revised third edition, Dr. Jaeger covers and uncovers some of the mysteries of this once humid, and now arid trough. He tells of the Indians of Death Valley, the mammals, birds, reptiles, amphibians, fishes, insects, trees, wild flowers and fossils. Paperback, 66 pages, \$1.50.

LOST MINES OF DEATH VALLEY by Harold Weight. This is a new approach to the enigma of Death Valley Scotty's life and legends and gives additional insight into the Lost Gunsight and Breyfogle bonanzas, plus other Death Valley mysteries. Paperback, historic photographs, reference material, 86 pages, \$2.50.

GREENWATER by Harold Weight. Called the "monumental swindle of the century" this is the story of the 1906 stampede to the Black Mountains and how \$30,000,000 disappeared. Paperback, historic photos, 34 pages. \$1.00.

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INSIDE DEATH VALLEY by Chuck Gebhardt. A guide and reference text of forever mysterious Death Valley, containing over 80 photographs, many in color. Included, too, are Entry Guides and Place Name Index for the convenience of visitors. Written with authority by an avid hiker, backpacker and rockclimber. 160 pages, paperback, \$4.95.

DEATH VALLEY GHOST TOWNS by Stanley Paher. Death Valley, today a National Monument, has in its environs the ghostly remains of many mines and mining towns. The author has also written of ghost towns in Nevada and Arizona and knows how to blend a brief outline of each of Death Valley's ghost towns with historic photos. For sheer drama, fact or fiction, it produces an enticing package for ghost town buffs. Paperback, illus., 9x12 format, 48 pages, \$1.95.

BALLARAT, Compiled by Paul Hubbard, Doris Bray and George Pipkin. Ballarat, now a ghost town in the Panamint Valley, was once a flour-ishing headquarters during the late 1880s and 1900s for the prospectors who searched for silver and gold in that desolate area of California. The authors tell of the lives and relate anecdotes of the famous old-timers. First published in 1965, this reprinted edition is an asset to any library. Paperback, illustrated, 98 pages, \$3.00.

LOAFING ALONG DEATH VALLEY TRAILS by William caruthers. Author Caruthers was a newspaper man and a ghost writer for early movie stars, politicians and industrialists. He "slowed down" long enough to move to Death Valley and there wrote his on-the-spot story that will take you through the quest for gold on the deserts of California and Nevada. Hardcover, old photos, 187 pages, \$4.25.

SELDOM SEEN SLIM by Tom Murray. Profiles and vignettes of the colorful "single blanket jackass prospectors" who lived and died as they looked for gold and silver in Death Valley. Slick paperback, exclusive photos of the old-timers, 65 pages, \$3.00.

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A Peek in the Publisher's Poke

E'RE PROUD to welcome artist Lloyd Mitchell to our pages this month. Lloyd is a member of the American Indian and Cowboy Artists Association and is a really grand fellow. His artristy covers all aspects of the West, and his tremendous sense of humor is reflected in his "Skinny Saloon" paintings. Be sure to say hello to Lloyd, as well as many other AICA members at the 26th Annual Death Valley '49er Encampment this month.

Speaking of the Encampment, it is being held November 6 through the 9th, and we have included the complete '49er Program of Events on pages 32 and 33. Be sure to attend and join in on the fun. The '49ers are a non-profit organization, but the volunteer members go all-out to provide the many events and activities that keep Death Valley's historical background alive. They must count on your donations, so be sure and join up this year if your are not already a member. Your membership fee will be well used, and you can be proud to be a part of this

Early reservations are a must for the Encampment. Folding chairs or camp stools are handy for attending the various activities. The nights can get chilly, so take ample bedding and clothing. There are several locations where meals and groceries are available. If you are camping, be sure to bring your own firewood as it is available at stores only.





GHOSTS OF THE GLORY TRAIL by Nell Murbarger. A pioneer of the ghost town explorers and writers. Miss Murbarger's followers will be glad to know this book is once again in print. First published in 1956; it is now in its seventh edition. The fast-moving chronicle is a result of personal interviews of old-timers who are no longer here to tell their tales, Hardcover, illustrated, 291 pages, \$7.00



30,000 MILES IN MEXICO by Nell Murbarger. Joyous adventures of a trip by pick-up camper made by two women from Tijuana to Guatemala. Folksy and entertaining, as well as instructive to others who might make the trip. Hardcover, 309 pages, \$6.00

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Books for Desert Readers



HISTORICAL ATLAS OF CALIFORNIA By Warren A. Beck and Ynez D. Haase

Warren A. Beck, chairman of the Department of History in California State College at Fullerton, and Ynez D. Haase, professional geographer and cartographer in Santa Barbara, California, are the co-authors of this intriguing historical atlas of the Golden State.

California, with its great diversity of landforms, has an unparalleled range of climate, soils, and natural vegetation. All these influence where man lives, what he does with the land, and what kind of communication and transportation he has. Beck and Haase have collaborated to record these and other aspects of California's geography and events of its history. The narrative is illustrated by 101 excellent maps presenting information previously available only

to the scholar, and in some cases not available at all.

The maps cover all of the physical characteristics of the state and also have substantial detail on the flora and fauna. All phases of history, from the Indian era down to the present, are included.

There are maps of major faults and earthquakes, early Spanish explorations, Mexican land grants, mountain passes, and routes to the gold fields. The gold rush period, 1849-69, is mapped and explained, as well as the main stage coach roads and Wells Fargo offices. The reader can trace the route of the Pony Express, locate the great sheep and cattle ranches, and find the Butterfield overland mail route.

CCC camps, World War II installations, and the St. Francis Dam disaster are depicted and discussed. The authors have mapped the Santa Barbara oil spill, the major irrigation systems, the wild land fires, and even the political districts of the state. All these and many other topics from the present and the past are fascinating reading.

Extensive documentation and pertinent detail make this atlas a valuable aid to historians. Its fluent style and simplicity of language make it an excellent reference to the student, the scholar, and everyone interested in the Golden State.

Hardcover, profusely illustrated, extensive index and reference, large format, 101 pages, \$9.95.



WHERE TO FIND GOLD IN THE DESERT and WHERE TO FIND GOLD IN SOUTHERN CALIFORNIA

By James Klein

James Klein, a rugged former newspaperman turned actor, was introduced to gold prospecting ten years ago, and

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7590 Cypress [at Van Buren] P. O. Box 4277 Riverside, California 92504 Telephone [714] 785-1330 caught gold fever almost at once. A partner in K.&M. Mining Explorations Company, which is now developing three gold mining claims, he spends most of his time in the field looking for new deposits. Having prospected extensively all over California, Jim now shares the knowledge he has gained in his two books, Where to Find Gold in the Desert, and Where to Find Gold in Southern California. He has taken gold out of every area listed.

His first book, Where to Find Gold in Southern California, pinpoints the area around the Los Angeles basin. Starting with the placers around the Newhall-Saugus region, (it was here that he found his first piece of gold), he tells where the first gold was found, when it was found, who found it, how much was found in the past, and where you can find it now. Lost treasure tales are also passed along, and the latest clues to their location.

Some of the areas listed are: Acton, Frazier Mountain, San Gabriel Canyon, Lytle Creek, Holcomb Valley, Pinacate, Orange County and Julian-Banner.

Also included is a section on the equipment needed to find gold, how to use it and how to stake a claim.

Where to Find Gold in the Desert is a sequel to the author's first book. Areas covered include the Rosamond-Mohave, El Paso Mountains, Randsburg, Barstow, Dale, Anza-Borrego, Chocolate Mountains-Tumco-Potholes, Arizona and other gold-bearing locations.

Some gem areas are included, as well as the lost treasure tales of each region, and the chapter, "Some Tips on Desert Prospecting" contains excellent information for both the beginner and the old pro.

Where to Find Gold in the Desert, 112 pages, paperback, \$4.95.

Where to Find Gold in Southern California, 96 pages, paperback, \$4.95.



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The Jayhawker Treasure

by RICH TAYLOR



OMEWHERE NEAR the now-obscured Jayhawkers Trail that was painfully paved across the desolate floor of Death Valley in 1849, lies buried \$6,000 in shiny gold eagles. In the same area with this treasure, prized family heirlooms such as valuable china, albums, musical instruments, furniture, books and other items were put into the ground for safekeeping. And, according to the record, neither the gold coins nor the heirlooms have ever been recovered.

In 1849, a group of ill-fated pioneers known as the "Jayhawkers" was forced to abandon their wagons on the blistering floor of Death Valley. They packed what they could on their weakened oxen and began the long trek out.

Thomas Whannon, wealthy by

1849 standards, had \$6,000 in gold eagles with him. After transferring the heavy gold coins to one of his oxen, he followed the rest of the pioneers for a day and a half. At that point, they reached a place called Snow Camp, somewhere on the White Sage Flats, in the Panamint Mountain Range.

There, Shannon's oxen gave out. As was customary, the animal was killed and the meat was dried in the hot sun for the half-starved company

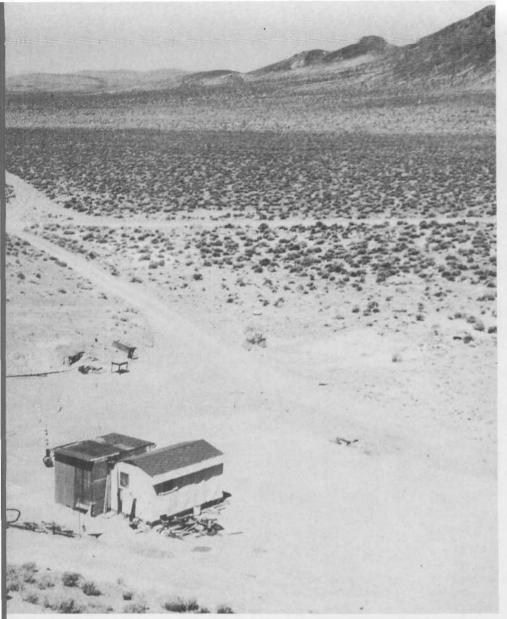
Knowing that he would never be able to pack the heavy gold across the miles of desolation to civilization by himself, Shannon hit upon a desperate plan.

He offered any man at Snow Camp half of his gold coins for carrying out all of them. But not one man would accept his offer. All they were interested in was carrying enough water to make it through. And all of that gold would not have bought a drop of water where there was none to be had.

Shannon had no choice. He was forced to bury his \$6,000 in gold eagles at Snow Camp. And it is a matter of record that he never went back to claim it. At the same time, many of the other Jayhawkers also buried their valuables somewhere near this campsite.

John B. Colton, the youngest of the Jayhawkers, verified that the gold coins had been buried, and gave an approximate location. He stated that the gold was buried in a canyon in the Tucki Mountains, just where the Towne-Martin group (also known as the Georgians) found the Gunsight silver.

There is only one problem—today, no one knows



exactly where Snow Camp was. In different accounts it is called both Snow Camp and Summit Camp. The Summit is a large mesa covered with bunch grass, and according to some accounts, Summit Camp was located in a canyon about 20 yards wide, just below the canyon's edge.

It seems that White Sage Flats and Summit may have been one and the same place. If this is the case, White Sage must have included Harrisburg Flats.

Snow Camp was described by some of the emigrants as being a dry camp located near the base of high snow-covered peaks to the right of the pass, as they went up. Personal accounts state that they camped close to the snow so they could melt it for water. Also, they stated that snow fell on the camp while they were there. A careful

Photo from Harold O. Weight collection. check of weather conditions in Death Valley might pay off.

In 1869, an attempt to recover the gold coins was made by William B. Road, a former Jayhawker. According to his account, his party located the old campsite, and searched carefully. They found charcoal, bones from the slaughtered oxen, and other remnants, but they didn't know exactly where the gold eagles had been buried, and a cloudburst had somewhat altered the canyon. They didn't find the coins.

Today, that \$6,000 in gold eagles is worth more than \$100,000, a prize well worth seeking. If you decide to look for it, be sure to take a partner and plenty of water. The desert can be just as treacherous today as it was in the days of the Jayhawkers

of 1849.

Death Valley Junction

Stay at the historic AMARGOSA HOTEL

This lovely 50-year-old hotel is being rejuvenated. 20 rooms opening October, 1975. All carpeted. All beautifully furnished. You, your family or your group can make the Amargosa Hotel your headquarters while in the Death Valley area.

You can now dine in the restored DINING ROOM in the Hotel. A separate banquet facility is available for groups.

Telephone Death Valley Junction #1 for information or reservations.

Don't miss seeing Marta Becket at her famous AMARGOSA OPERA HOUSE. You've read about this beautiful and unique attraction in *Desert* and *National Geographic*. Make a visit to the Amargosa Opera House a must while you're in this area. See Marta Becket's fabulous murals inside the Opera House. Performances on Friday, Saturday and Monday evenings at 8:15; doors open at 7:45.

Telephone Death Valley Junction #8 for reservations. Tours welcomed.

The AMARGOSA GENERAL STORE, Death Valley Junction Service Station and AMARGOSA POTTERY are open. Space is available for development. Watch this space each month for more news as the restoration of Death Valley Junction continues.

For further information about DEATH VALLEY JUNCTION please write:

Death Valley Junction, Inc. P. O. Box 675 Death Valley Junction, California 92328

Desert/November 1975

BLACK GOLD OF THE SAHUARAL

by HAROLD O. WEIGHT

OSE ALVARADO never actually saw the black gold of the sahuaral himself. Never, in fact, even reached the sahuaral. But he knew the gold was there, and he knew where the sahuaral was — roughly. About 75 miles east of Yuma, and south of the Gila River. He had almost reached it once, when he went out with the Greek. Was within 10 miles — and if only the man hadn't been such a poor desert driver.

A sahuaral? Jose Alvarado said it was simply a place — a grove, if you will — where the giant sahuaro cacti grew. Only this one, where in places the sahuaros grew so thickly a man could scarcely walk between them, was a very special sahuaral:

"The Indians used to go up there in the summer time," Alvarado said. "Pack this sahuaro fruit out. The little Indians used to go up on top of the hills there and pick up gold. Bring in the gold — oh, lots of gold — and play with it, see. The old Indians made them take it

back and throw it away. Never touch it any more. Gonna die.

"This Indian, this old squaw, I knew her when she was a kid in Palomas. And she says the gold — you go and look at it, you think it is black pebbles. Little bits of rock. But you pick it up, she says, the other side is yellow."

Jose Alvarado was a true believer in lost mines, lost ledges and lost treasures all his life. The Arizona of his youth nurtured such faith. Lost mine legends were numerous and respectable. They were no more fantastic, their riches no more fabulous, than actual strikes that had been and were being made: La Paz, Antelope Hill, the Potholes, Laguna, La Fortuna, the King of Arizona, the Harquahala.

And Alvarado was no armchair lost mine hunter, credulous because uninitiated in mines and mining. Starting at 18, at La Fortuna, he worked in most of the great mines of those days.

"La Fortuna — the gold was awful rich," he remembered. "Why you could, after a big blast, in the drifts — you could go up there with a miner's candlestick and pry nuggets out. You could see, lots of times, wire gold hanging there on

the ceiling of the drift. Rough gold hanging there."

Why shouldn't golden nuggets lie also on the hilltops of the sahuaral?

While Alvarado's definition of a sahuaral is quite accurate for today, in olden times it was much more than that. In those days the Indian economy of southern Arizona if not based on the sahuaro, was largely dependent upon it. The Papago year began with a month called Sahuaro Harvest Moon. When the egg-sized, crimson-fleshed fruit ripened in June, villages and groups of the Papago, the Pima and the Yavapai moved out among the towering cacti and camped and remained there until the season ended, usually about mid-July.

The fruit was gathered by the women, who hooked it down with sahuaro-rib poles, thumbed the red pulp from its spiny skin, and dumped it into watertight baskets. It was eaten fresh. It was made into jam. It was dried and pressed into balls. It was boiled in big jars, reduced to a sweet syrup, and sealed away in clay pots. And, perhaps most relished by the men of some tribes, its juice was fermented into a very potent wine. Imbibed excessively during the important

Jose Alvarado and Ed Rochester, who both were practical mining experts, discuss the merits of a piece of float Alvarado had brought in.

night-long ceremonials and festivals that followed the sahuaro season, this wine often resulted in another odd sort of harvest for the tribeswomen, who had to gather up their husbands and their husband's scattered belongings, and drag them home.

Obviously, a good sahuaral would be a very important asset, and probably the recognized property of a particular village or clan. The one Alvarado sought was the fruit-gathering territory of a band of the so-called Tonto (Fool) Apaches who lived in the Palomas-Agua Caliente area along the lower Gila. This was the country where Jose Alvarado "was raised, pretty near," and where he knew the small Indian girl who once played with golden pebbles.

"I do not know why they called them Tontos," Alvarado said. "They were gentler than the others. But if you did not treat them right — goodnight! They would camp around our ranch and were

friendly, and my father got pretty well acquainted with them. Had lots of cattle, and when he would kill beeves, he would give them all some."

Many others, including authorities such as Frederick Webb Hodge, have puzzled about that "Tonto" label. "Socalled because of their supposed imbecility," he wrote, "the designation is a misnomer." And he noted that the term was applied by Nineteenth Century writers to practically all Indians roaming between the White Mountains and the Rio Colorado.

Hilario Gallego, an early Tucson citizen, gave the most reasonable explanation I have found in his recollections in the *Arizona Historical Review:*

"There was a kind of peaceful tribe of Apaches that had a camp right out of Tucson a little ways. Then there were the others, the wild Apaches, who were always on the warpath. The wild Apaches called the peaceful Apaches 'Tontos,' or 'Fools.' Any Apache who wanted to be peaceful would come and stay with these Indians near town; then the wild Apaches would follow them up and try to kill them."

The Palomas band apparently were people of the Western Yavapai. They were among those rounded up during the savage warfare in Arizona in the early 1870s, were taken to Camp Verde, then uprooted and forced to make a cruel march to the San Carlos Reservation. From San Carlos, many Apaches slipped away, or were allowed to leave as tensions lessened. This group came back to the Gila.

When George Wharton James visited the Palomas band at the turn of the century, he reported that they surpassed all other Apaches in the weaving of baskets. And he found that Alvarado's opinion was shared by other neighbors:

"From the storekeeper and farmers of Palomas I learn they are good workers, most of the men being engaged as helpers on the ranches. They are intelligent, honest, capable and reliable. Their word once given, they can be depended upon to perform what they have said. Indeed, M. J. Fred Nottbusch, the Palomas storekeeper, assures me that he has learned to respect and esteem them highly for their good qualities, their manliness and character."



A sahuaral, Jose Alvarado said, is a place where the giant sahuaro cacti grows, and where Indians once gathered its fruit.



Ruins of the old Nottbusch general store at abandoned Palomas village, almost hidden by a wild growth of athel. Photographed in 1954.

Palomas was a largely Mexican village, hidden in thickets of great mesquite trees, on the north bank of the Gila near present Aztec. The 14-mile-long Palomas canal, first used in 1887, was one of Arizona's early irrigation projects. The great Gila River flood of 1905 washed out the heading and damaged the project so badly that the canal was abandoned. But the scattering of wooden and adobe houses remained a stopping place on the old river road between Phoenix and Yuma, and Nottbusch's store survived as a trading center for many years. As late as 1920, the village had a population of 46.

Palomas was named — well named — for its ever-present doves, both white-winged and mourning. When we first visited it, long after the last human inhabitant had moved away, their calls and gentle complaints still filled and vibrated the air around its ruins.

Before it became Palomas, with establishment of a post office so named in April 1891, the village was known as Doanville. Before there was a Doanville, small cattle ranches were scattered over the mesa. Alvarado's father established one of them in 1878.

Jose junior was an Arizonan, born at Yuma January 17, 1879, but his parents were Californians. His father was a son of Juan Bautista Alvarado, who was governor of California from 1836 through 1842 — first as a successful revolutionary and then as a Mexican appointee. His mother was born in Los Angeles. Jose Alvarado senior first came to Arizona as a freighter, hauling goods from San Diego to Yuma. Later he moved to Arizona Territory, and then to the Gila Valley.

In early days the Gila was a river to be reckoned with. The Alvarado family lived on their ranch until the historic Gila flood of 1891, in which most of their cattle were drowned. Alvarado retained the ranch, but moved his family into Yuma. There young Alvarado grew up, learned the printing trade, and went to work for the Yuma Sentinel. He set type by hand, ran the old Washington hand press, finally became shop foreman. But the work proved unhealthy for him. He decided to build up his strength with more rugged labor.

"When I went to the Fortuna, I had never been in a mine, knew nothing about mining. But I knew the superintendent pretty well, so I took a chance. Worked in the mine quite a while. Worked down to the 900-foot level. One day a miner got killed. I was pretty young then. I quit and went over to Tumco, and worked there."

Tumco. Picacho. The Harquahala. The King of Arizona. During World War I, with mining slack, he operated a dairy at Yuma. And in 1928, he was back on the

Gila, running wild horses. His camp was at the ranch of an old woman named Juana, whom he had known at Palomas. The family was very poor, and he had hired the two sons to help catch the wild horses.

"At night, there at the house, we would have a big bonfire," Alvarado said. "One night this old Indian was there. He used to know Juana too, at Palomas, when he was young — when there were jobs at Palomas and he came there to work. And this night he was telling her about the sahuaral.

"' 'Get the team and horses,' he said.
'Take the boys. Go over to the sahuaral.
There you're gonna pick up lots of gold.
My father used to take us back and make us throw it away. Wouldn't let us have it.

"'You can go up there in two days and back. You gonna find it. And if you don't find it, come over to my house and I'll go with you."

"I was listening, and remembering what I had heard about the sahuaral, and the next day I told the boys:

"'Boys, I got a car here." (This Dodge, you know. Old time Dodge.) 'I can go anywhere in this car,' I says. 'Let's go up there. Leave the horses. We'll go up there now.'

"Oh, no. They wouldn't go. Indians would never touch the gold. Up to this day they won't touch it. These boys were half Indians themselves, I guess. They were afraid to go.

"They said, 'No. Let's get the horses first, and then we'll go."

"I could never get them to go with me. I could have gone, but I wanted them to go so they could get their share. No, they wouldn't go at all."

An Indian taboo against gold strong enough to survive into modern times? Ed Rochester, with us talking to Alvarado, had spent much of his life on or at the edges of the Yuma Reservation. Yes, said Ed, it could be. He knew young Yumas, educated, otherwise "modern" who believed they would die if they led white men to hidden gold. He knew one who had died. Such taboos probably were the result of disastrous past tribal experiences. Ed recalled a Yuma legend that warriors from the south had enslaved these people long before the Spaniards came, and had forced them to gather gold until they had revolted and destroyed their masters.

With his wide knowledge of desert

roads, trails and places, Rochester tried to narrow the possible location of the golden *sahuaral*. Alvarado remained vague; it was close to the old freight road, he thought. What freight road? The one to Ajo.

Ed finally concluded it must be the one from Ajo to Sentinel, then on to Yuma. That ancient route dated from the 1860s, when Ajo ore was hauled to the Colorado River and shipped down the Gulf of California. And the *sahuaral*, he figured by the mileage, might be south and a little west of Black Tanks in the Crater Mountains.

Had placer gold ever been found in that section, I wondered.

"Well," said Alvarado, "nobody ever looks for placer in that country. Prospectors don't go up in there. Water's awful scarce in that country."

Jose Alvarado made the one hunt for the sahuaral that he told us about, with his Greek acquaintance, before there was a bombing range. Alvarado was doubtful about the expedition from the beginning. He had made one memorable lost mine hunt with this man before, up in the Eagle Tail Mountains.

"He broke down up there," Alvarado said. "We got stuck. I told him: 'Don't put that gas on strong. Go slow! You gonna break the car!' Oh no! He got mad and put the gas on so strong he broke the axle in two. And there we was. That was pretty near summer, too. Awful hot. We walked out. Twenty-five miles to the Quartzsite highway, to catch a ride."

He went this second time because he wanted to find that *sahuaral*, and the Greek was the only one anxious to take him. They left Aztec early in the morning, and as Alvarado feared, trouble

began as the road deteriorated.

"He had to get stuck, and I had to get out and push the darned car out. He don't know how to drive. He used to go on the good ground and hit the sand, see. And then he'd stop and change gears. After he was stopped, he couldn't pull out. He'd go down.

"We must have been pretty close to this placer country and he gets stuck again. And it was pretty hot.

"I told him: 'I can't push no more. My shoulders are sore now from pushing you. You let me drive, we don't get stuck. You don't let me drive, I ain't gonna go any farther with you. You gonna break the axle again."

"He wouldn't let me drive. So we went back."

Alvarado was 75 years old when he told us the story of the black gold of the sahuaral, in January 1954, but he seemed willing to try again to find it. And both Ed Rochester and I were tolerable desert drivers.

But there was then — and is now — another reason why prospectors don't go up in that country, a reason the old-timers could not even have conceived. If the golden sahuaral exists, it is in or on the edge of the huge, sprawling Luke Air Force bombing and gunnery range. The map warns: "Do not leave right of way on main traveled roads. Use roads open to public only."

And just this spring, as we followed the Gila Bend-Ajo highway and gazed longingly across at the Crater Mountains, military jets screamed across the highway—only feet above us, it seemed—and blasted targets over the mountains. It is an unnerving experience, and the range certainly should not be entered without official permission.



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Desert GHOSTS by HOWARD NEAL

Death Valley Charcoal Kilns

LOCATION: The charcoal kilns are located in Wildrose Canyon, seven miles east of Emigrant Canyon Road, near the western boundary of Death Valley National Monument.

BRIEF HISTORY: The history of Death Valley country is replete with legends of lost mines. One of the most famous is the story of the Lost Gunsight. It is said that a member of the Death Valley party of 1849 found a fabulous vein of silver in the mountains somewhere west of Death Valley itself. The silver was reputed to be so pure that a gunsight was carved from it. The discovery was ignored, and its location lost, because of the eagerness of the party to move on to the gold fields of Northern California.

The Lost Gunsight silver was not forgotten, though, and within a few years prospectors were combing the Panamint and Argus Mountains in search of the rich lode. It is assumed, even today, that the Gunsight remains lost. Yet, silver was found

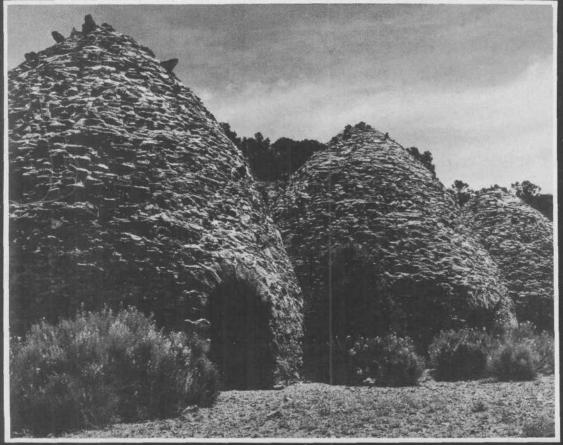
in the Panamint Mountains, in Surprise Canyon, in 1873, and at Lookout in the Argus Range, in 1875.

Both discoveries proved to be rich. The Argus claims were quickly purchased by developers including Senator George Hearst's Modoc Consolidated Mining Company.

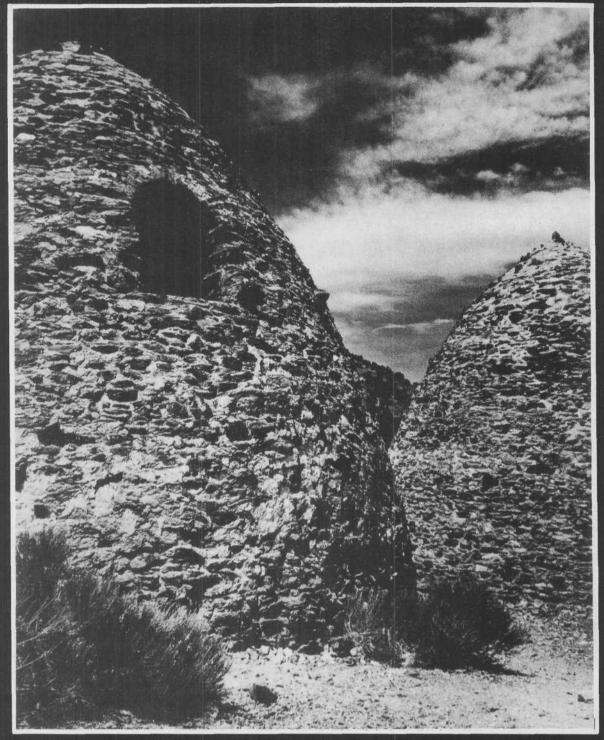
The need to haul heavy ore from the Argus Mountains, across much of the length of the Panamint Valley, and up steep and narrow Surprise Canyon to Panamint City for milling made it quickly obvious that Lookout needed its own processing facilities. Charcoal, too, was needed for use in the reduction of the silver-lead ore.

The most convenient stand of trees which could provide wood for charcoal was in Wildrose Canyon, some 25 miles directly across Panamint Valley. In that canyon Hearst's company bought extensive wood claims and, reportedly using Swiss stonemasons and Chinese laborers, in 1877 built 10 huge kilns to feed the Lookout smelters.

The kilns, some 25 feet high and 30 feet



Ten charcoal kilns are located in Wildrose Canyon near the western boundary of Death Valley National Monument. Built in 1877 to provide charcoal for the smelters of the Modoc Mines, the kilns are nearly 25 feet tall and 30 feet across.



Pine wood was cut from the slopes of the Panamint Mountains and loaded into each kiln through both the door and the high window. After the wood was burning properly iron doors were shut over both openings causing the fire to smolder slowly. **Photographs** by Howard Neal.

across, were designed with a low doorway and a higher window. Each kiln has small vent holes around its base. In use, wood was piled through the openings and set on fire. When the fire was burning properly heavy iron doors were closed over both the door and the window. With limited air circulation the fire smoldered slowly turning the wood into charcoal.

As the mines at Lookout went, so went the Wildrose Canyon charcoal kilns. Within a few short years the silver veins in the Argus Mountains pinched out, the Modoc mines closed, and the kilns cooled to become yet another desert ghost of Death Valley.

THE CHARCOAL KILNS TODAY: One of the major attractions of Death Valley National Monument, the charcoal kilns are among the best preserved examples of such kilns in the West. The visitor to Wildrose Canyon will find a well maintained (but steep) road to the kilns, camping facilities, and pleasant picnic spots in the pines, at the 6,000-foot level, near the kilns. Today, all that can be heard is the whisper of the wind through the pines and the occasional distant bray of a wild burro. It is difficult to believe that nearly a century ago dozens of Indian laborers worked feverishly to fell the pines on the Panamint slopes and feed the fires of the Death Valley Charcoal Kilns.

LONG THE scale of human emotions, anticipation is perhaps the most descriptive characteristic of one's feeling when planning a visit to Death Valley National Monument. This will be the case whether the visit is the first, or another of many. The visitor may travel up and down the same roads from season to season throughout the Monument, yet view a different landscape each and every time. This changing scene may be brought about by the time of day, the cloud cover, or the amount of rainfall during the past summer.

An unstable cliff face of sandstone may have finally given way to the elements and left exposed a new facade of colors never thought to exist behind the bland walls. A new wash might have been formed due to the previous summer's rain, or a familiar wash will have appeared to alter direction or size. All these changes are in a continuum as Nature does her thing with the weather, geology and the plants. The extremes of the Valley's climate contribute greatly to these changes; some subtle and some gross. But, Man has and will have his way toward influencing the changing scene, and his actions should always be taken into account when discussing Death Valley.

Except for those changes wrought by Man and his vehicles, most of which are fortunately random but predominately unexpected, a good portion of the changing scene is predictable. The number of available campgrounds, motel and hotel services, roads and historic sites are but a few items in Death Valley's makeup that have a tendency to change from season to season. One forthcoming change in Death Valley that has unnecessarily alarmed a good number of citizens is the Wilderness Proposal, and is worthy of some explanation here.

There appear to be recognized organizations involved in conservation, historic preservation, or desert preservation who fear that the Wilderness Proposal will essentially "close down" their favorite areas. In reality, the particular wilderness designation for Death Valley will emphasize special corridors for backcountry access to eliminate "overriding" delicate terrain. For example, it is anticipated that 250 miles of existing Jeep roads and trails will no longer be accessible if the Wilderness Proposal is adopted. Granted, this sounds terrible to the

backcountry Jeep traveler, but the proposal must be fully understood. Basically, only two types of roads will be closed; multiple roadways and illegal extensions

Multiple use roads are spur roads branching off from main Jeep trails which encroach upon delicately balanced natural areas, and which have been made, for the most part, by backcountry explorers seeking a new challenging



route. The closing of illegal extensions is equally important since, as the term implies, many Jeep trails extend far beyond their intended and legal limits resulting in an impact to natural formations. A good example of the latter may be seen at the terminus of Cottonwood Canyon. Cottonwood Creek, a yearround water supply running about 50 gallons per minute, has been literally redirected due to the road extending a half mile past the creek's designated origin. Johnson Canyon, in the southern Panamints, has suffered a similar fate because the trail has been illegally extended several hundred yards past the mountain water mark. The road closures proposed in the Wilderness Bill will not pre-

vent the public from having access to these areas, but will force drivers out of their vehicles sooner to perhaps create another love—hiking!

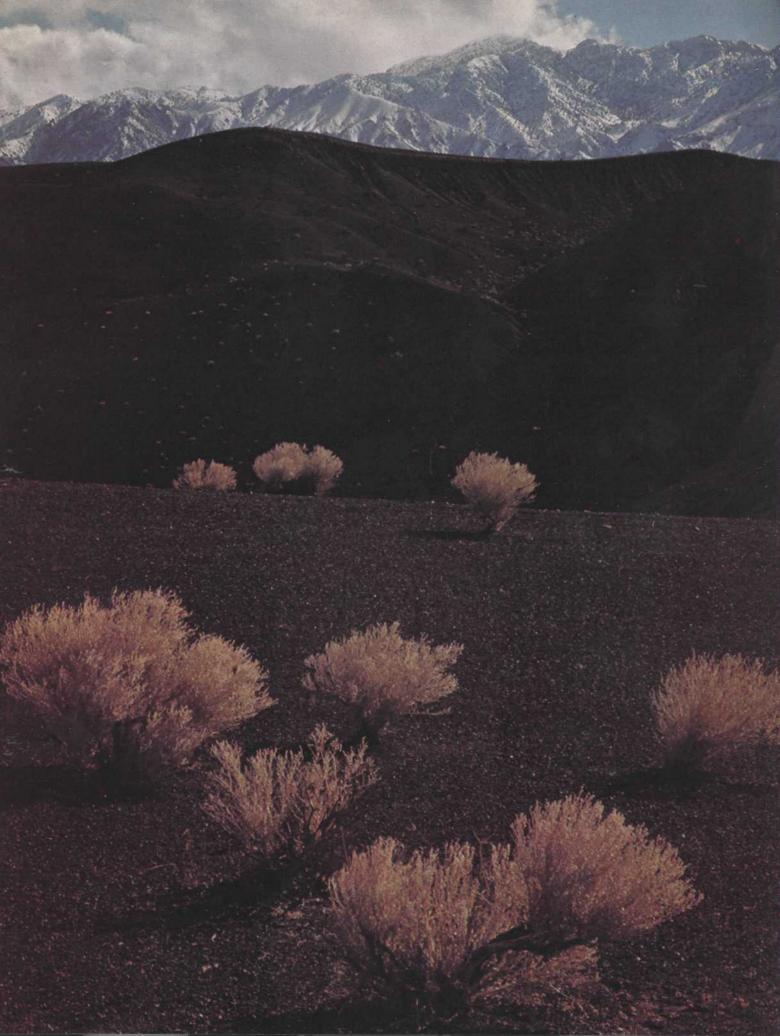
The Wilderness Bill (S.1101) for the establishment of the Death Valley Wilderness was introduced on March 7, 1975 by Senator Haskell, and is now in the Senate Interior and Insular Affairs Committee. Of equal note is an omnibus bill introduced April 9, 1975 to establish Death Valley National Park. When asked the difference between a Park and a Monument, the Park Service stated that a Monument is generally federally owned land (BLM) and requires only an Executive Order for establishment. A National Park is granted that status only by an act of Congress, and usually involves privately owned land. This latter bill is presently in the House Interior and Insular Affairs Committee.

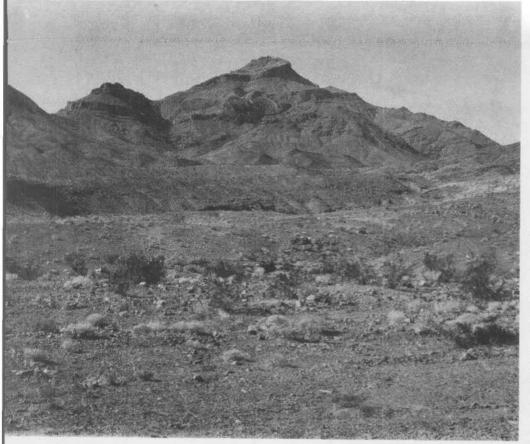
For the 1975/1976 season, the visitor to Death Valley will be treated to a special interpretive program by the Park Service as their contribution to the Bicentennial celebration. The program includes two themes; the U. S. Government in Death Valley, and mining in Death Valley. The former will describe the military and scientific expeditions of the period 1850-1900, and the latter will treat the past, present and future of Death Valley mining through the economic history of the mineral industry in the region. Associated with these themes will be talks at the Visitor Center and conducted trips to various spots in the Monument in addition to the traditional series of naturalist activities put on by the Park Service.

During early March of this year, the Death Valley Hiker's Association made a two-day spring backpack trek through Titus in the rain. Despite the inclement weather, dozens of cars (including a large motor home) made their way into the Canyon and out its narrow mouth without a single problem. However, this latter car trip was under the guidance of the Park Service and their vehicles were available in the event of an emergency.

As of April 1975, the road to Natural Bridge was in pretty poor condition, its surface scarred with potholes and

Sage pattern, rim view at Ubehebe Crater in Death Valley. David Muench photo.





The weird and rugged Corkscrew Peak, easily seen from the Central Valley, situated at the southern terminus of the Grapevine Mountains in full view of the Daylight Pass road.

ridges. West Side Road is, at times, equally questionable for the use of passenger cars. The main drawback of the latter road is its corrugated surface which plays havoc with lightly-sprung vehicles. Here again, the Park Service will be able to instruct the passenger car driver on the conditions of the road and whether or not it is fit to travel. A trip out to Racetrack Valley in other than a truck or 4WD can become hazardous at certain

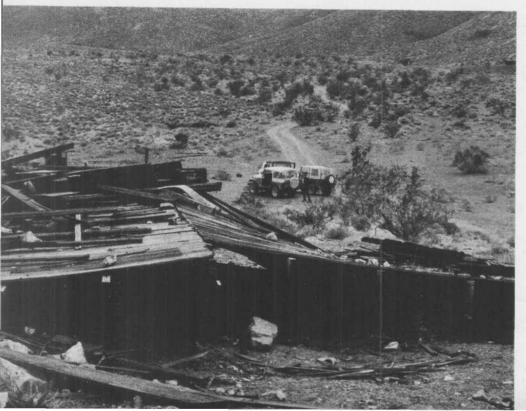
times of the year when heavy mountain rains or considerable snow melt in the Cottonwood Mountains overlay the road with piles of gravel. Backcountry trips afoot or by vehicle should always be preceded by good planning which includes notification to the Park Service of the route and times of the trip, and carrying more water than will be required.

The Death Valley region has seen an increase and improvement in overall ac-

commodations in the past few years. Both campground and eating/sleeping facilities have been expanded for the visitor's convenience. The governmentowned and operated campgrounds boast a total of 1600 sites for tenters, campers, trailers and motor homes. Few, if any, have shade worthy of mention. Except for the private trailer facilities at Stovepipe Wells Village and Furnace Creek Ranch, there are no electrical, sewer or water hookups at the campgrounds. Five of the Park Service campgrounds have sanitary stations (dumps) for those requiring it, and they are Furnace Creek, Texas Spring, Sunset, Stovepipe Wells and Mesquite Spring campgrounds. Complete hookups at Furnace Creek Ranch trailer park are \$4.00 per night, two people. At Stovepipe Wells Village next to the general store, trailer spaces with full hookups cost \$3.50 per night for two people.

If you have not been to Furnace Creek Ranch for a couple of years, there are a few surprises. Accommodations have increased and improved on the ranch with the construction of deluxe motel units off the golf course. By December 1, 164 units will be available for occupancy with rates starting at \$30.50 per night (two large units are already in service). Redwood cabins and poolside motel units are available at prices ranging from \$22 to \$27 per night. The beautiful Furnach Creek Inn, built in 1926, operates on the American plan (meals included) with room rates starting at \$69 and running all the way up to \$121 for a fourth floor connecting room.

Stovepipe Wells Village, built at the base of an alluvial fan under the shadow of Tuck Mountain, offers both an historic and scenic background found nowhere else in the Valley. It is presently owned



Jeepers take time out to explore the ruins at the ghost town site of Chloride City, high up in the Funeral Mountains



The remnants of a Cousin Jack structure, an idea of a home brought to the desert country by Welsh miners. In the background is the marsh of Saratoga Springs.

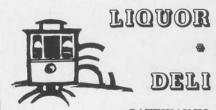
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by the friendliest people in the world, for each holiday season is a Jeep ride to Ellie and Trevor Povah, also owners and operators of the Hamilton Stores of Yellowstone Park. Accommodations range from small patio rooms to deluxe motel units, all with bath. Prices for the 80 units at the Village run from \$15 to \$25 for two. Due to the location of the Village, water has always presented a problem, and some rooms still do not have drinkable water. This problem should be overcome this season with the construction of a osmosis plant by the Park Service.

In the past, water was purchsed from the government's supply at Emigrant Spring (reportedly 700 gallons per day), and hauled by tank truck every two days to the Village. Despite this small setback, the Village offers a beautiful dining room, rustically decorated saloon, a gift shop, well-stocked general store and nightly slide talks by their own guides in the lobby/auditorium. The new manager of Stovepipe Wells Village, Jim Blaine, has mentioned that horseback riding is expected to be available by this November. Future plans for the Village include a new general store with a snack bar, a recreation center, tennis courts and a pitch and putt course. A special feature introduced by the Village management last Easter Week, that will continue through the coming season at every holiday period, is a series of personally conducted tours to sites little known to the average visitor. Included in these series

Chloride Cliffs, Titus Canyon or Racetrack Valley, road conditions permitting.

To prevent further changes to the unique desert region of Death Valley National Monument other than those planned and executed by the government, it is every visitor's responsibility to monitor the trash that they generate and the routes that they drive. If everyone would clean up their trash and never drive off established roads or trails, it is possible that Death Valley will change little in the generations to come.



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Desert/November 1975

Amargosa Gorge

by MARY FRANCES STRONG
photos by Jerry Strong

EVERING THE Inyo-San Bernardino County line, the Amargosa River Gorge cuts through the Alexander Hills almost due south of Tecopa, California. This unique desert river has not only carved a picturesque canyon, offered sanctuary to wildlife, and produced a spectacular recreational region, but has played an important role in the history of the Mojave Desert.

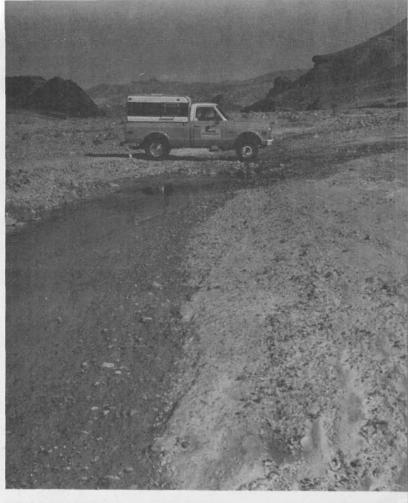
Amargosa Gorge is gorgeous! In places, its sandy-gravelly bottom widens to almost a half-mile, narrowing to only a few hundred feet at other points. It is typical of the flat-bottomed washes in flash-flood country, but on a much grander scale. High, erosion-fluted cliffs rise on each side of the river and blend into the upper flanks of the Volcanic Hills.

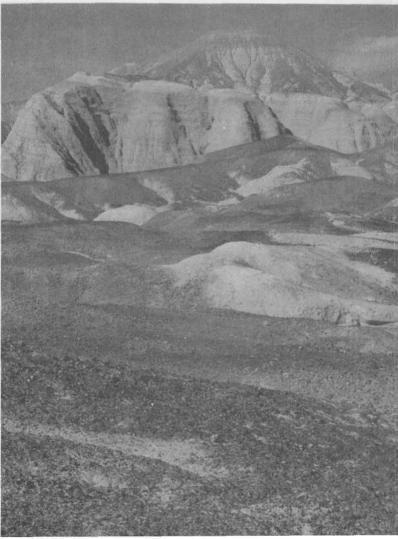
Though not brilliantly colored, the many outstanding geological formations have been delicately touched by Nature's subdued brush. It is when an early-morning sun's first rays highlight the canyon, or the blazing late-afternoon ones flood the formations, that their delicate, abstract beauty is best observed. Almost devoid of vegetation, the surrounding Alexander Hills stand boldly naked in this savage desert setting. Lying as it does at the southern end of Death Valley, this is not a region to visit between May and September.

Amargosa Gorge awakes from its summer hibernation in October. The river, rising from springs north of

southern entrance to its Gorge, the Amargosa River spills out onto a sandy plain and eventually disappears underground. Easily fordable at this point, it becomes a raging torrent following thunderstorms. Right: Exposed in a natural amphitheater is one of the finest petrified wood areas on the Mojave Desert. This region once hosted a subtropical forest of palms, tree ferns and

Above: At the





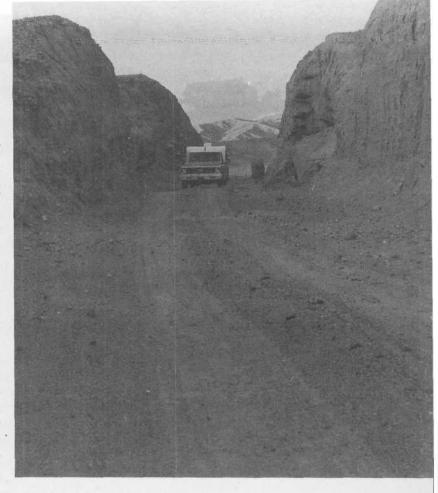
cycads.

Beatty, Nevada flows underground during most of its long, winding journey to the floor of Death Valley. South of Tecopa it surfaces, flows through the Gorge then sinks into a sandy plain at the southern entrance. Along most of its course, it is readily seen as a "river of sand."

Aborigines were the first visitors in Amargosa Gorge and considerable evidence of their leisurely tenure exists. The river was also known to early-day explorers. Annual horse-caravans from Mexico traveled through the Gorge on what was known as "The Spanish Trail." Though reportedly used for many years, there was little reliable information regarding the exact route.

One of the objectives of John C. Fremont's Second California Expedition in 1844 was to locate and map the trail's route through the desert region. Fremont talked with many people who had followed the trail to California. Guides had led their way and they could give him few details as to "where it was." Some of the sketchy directions given to

Many long cuts were made to accommodate the Tonopah-**Tidewater** Railroad through Amargosa Gorge and many serve as the roadway today. The long fills between them have not faired as well. Periodic thundershowers are cutting into the fills making them safe for traverse only by narrow vehicles.





him included, "Near the Pass (Cajon), in the mountains and along a river across the desert."

Entering the Mojave Desert via Tehachapi Pass, Fremont's party skirted the base of the San Gabriel Mountains and "struck" the Spanish Trail south of what is now Victorville. They followed it along the Mojave River for many miles. At a point east of Barstow, not clearly discerned, they turned north. Camps were made at Bitter and Salt Springs before they reached the southern entrance to Amargosa Gorge.

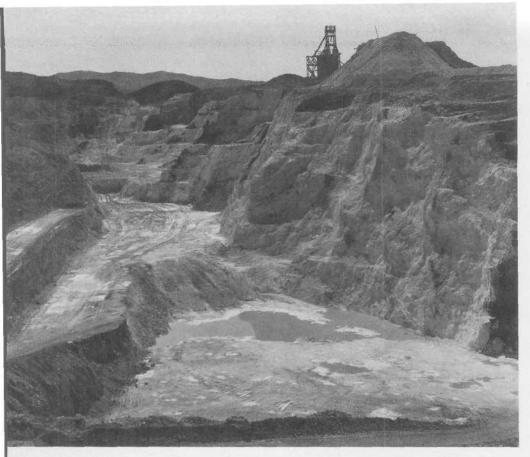
Of the river, John Fremont wrote, "It is called by the Spaniards — Amargosa — the bitter water of the desert." Fremont and his men headed north through the Gorge and he mentions stopping at springs along the river in his diary. Camp was also made at a large spring east of Tecopa. Fremont duly marked it on his map and named it "Aqua de Hernandez," in honor of two Mexicans a band of Indians had killed a few days earlier. Later, it was called "Resting Springs" by the emigrants and bears this name today.

Fremont's party continued through Nevada, reached Salt Lake City and eventually returned to the east. His comprehensive notes and maps of his explorations were subsequently published. Because of the information he had gathered about crossing the "fearful deserts," hundreds of people were willing to undertake the long hazardous journey over the Spanish and Salt Lake Trails to settle in Central and Southern California.

There are several ways to explore Amargosa Gorge but it should not be done in a hurry. Too much can be missed during a brief reconnaissance. Personally, I feel it is at its best when viewed coming down from the north (Tecopa) and following Sperry Wash Road into the Gorge. Driving up from the south (Dumont Dunes Area) does not allow the fine bird's eye view of the many unusual geological formations. This is especially true in morning light — the sun 'just ain't right.''

Newcomers to this fascinating corner of the Great Mojave Desert will find a 46-mile circle tour a delightful way to acquaint themselves with the region. Remember, I said Amargosa Gorge is best viewed when coming down into it from the north. To do so, let's start the tour from the junction of State Highway 127 and Sperry Wash Road — 35 miles north of Baker. See map.

From the above point, Highway 127



After over 60 years of production, the Western Talc Mines are idle. It has been the largest producer in San Bernardino County.

heads north up a long grade over the Alexander Hills. At the summit of Ibex Pass you will be treated to a fine view of Ancient Lake Tecopa — now a drylake bed exposed in an elongated basin between desert ranges. It was formed when the climate was less arid and waters of the Amargosa River were restricted by the Alexander Hills. Eventually, the impounded water cut through the hills to create Amargosa Gorge. The river is still at work today. Following heavy thunderstorms, the rush of water continues to cut its channel ever deeper and wider.

From the summit, the road descends and in about six miles our route turns right onto a paved road marked "Old Spanish Trail Road." It will take you along the southern edge of the lakebed which is dotted with hills, buttes and pinnacles in muted shades of grey, white, beige and brown. Just before entering the little community of Tecopa, an abandoned railbed will be crossed. Early in this century, Borax Smith's famed Tonopah-Tidewater Railroad played an important role to keep mining alive in the Tecopa area.

"Resting Springs," three miles east of Tecopa, offered sanctuary to the first explorers. Later, it would provide respite

to emigrants and prospectors who traveled the Spanish Trail to California. However, it wasn't until 1865 that rich silver and lead deposits were located in the southern end of the Nopah Range. Development of the Gunsight Mine followed. A 12-stamp mill and several furnaces were built to process the ores, as well as those from other properties. By 1900, mining had become intermittent. However the completion of the Tonopah-Tidewater Railroad in 1907, brought a resurgence of mining activity which continued until the depression of the 1930's.

Construction of the T & T through Amargosa Gorge is a tale of frustration, misery and victory. This 12-mile section of track-laying encountered almost unsurmountable problems. The route required a number of long cuts and very long fills. Without the large equipment available today, Smith had to use "pick and shovel" man power. In addition to minor trestles, major ones over 500 feet long had to be built.

Work on this section of track began in May when temperatures were climbing well over the 100 degree mark. Night brought little relief and made working conditions abominable. As summer progressed, the men refused to work in such

heat and left their jobs. Rumors circulated in the hiring halls at Los Angeles — "Men are dying in Death Valley." Consequently, few men were willing to sign on and the contractor went broke.

Work ceased until the weather cooled and men returned to their jobs but all "troubles" had not disappeared. Additional laborers, mostly Mexicans, were hired and, though work continued, many unfriendly incidents occurred between the "Mexicanos and the Whites." There were also delays in receipt of supplies so progress through the Gorge was at a snail's pace.

Finally, on October 7th, the last spike was driven at end-of-track — Gold Center, Nevada. It was not a happy day. The Panic of 1907 had closed the banks and brought on a depression. The future of the Tonopah-Tidewater Railroad was in doubt.

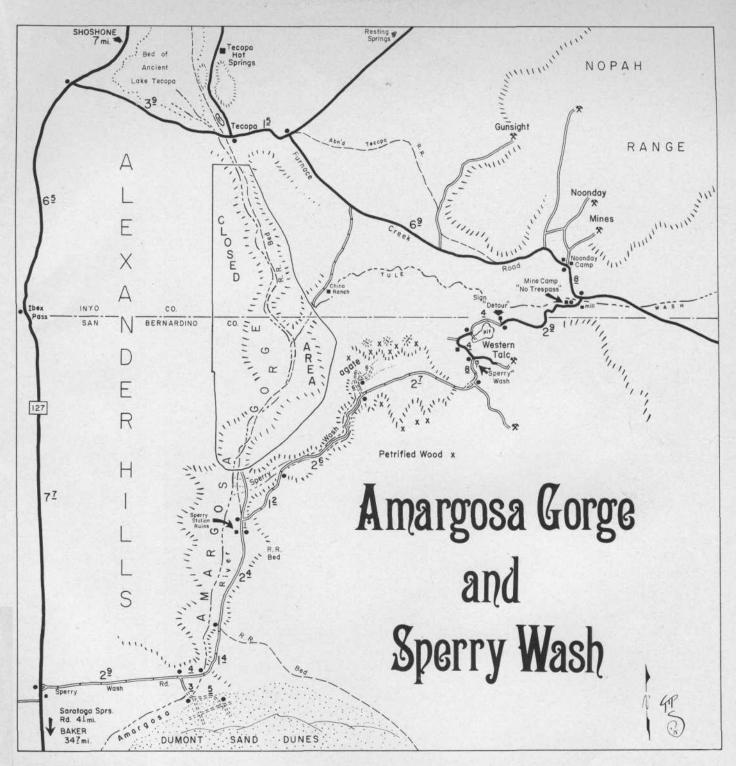
From Tecopa, our circle tour swings southeasterly. It passes the Gunsight Mine, high on the hills to the left, and goes through the middle of Noonday Mine Camp. The latter is in good repair though boarded up and guarded by a caretaker as the mines are inactive.

A mile south of Noonday, turn right and cross Tule Wash. Continuing west, a paved road leads by an old mill and fairly-modern mining camp. The latter was built over the site of an older one. Hidden from view by newer, wooden buildings are several old adobes dating back at least to 1865. The camp is posted "No Trespassing."

Still following the paving west, our route leads by the Western Talc Mine — one of the largest in San Bernardino County. There has been considerable production at this property and a detour now leads around a recently excavated pit. The mine was idle in 1974.

A short distance beyond the pit turn right onto a graded dirt road. A sign at this junction points the way to 'Sperry Wash.'' Three miles of travel down a broad alluvial fan will bring you to the upper entrance to Sperry Wash Canyon. It is in the surrounding area that some of the finest petrified wood on the desert has been found.

First located in 1956, there is an almost unbelievable variety of wood. Red and white palm fiber; black agatized roots and limb sections; orange-colored wood, and pink and tan cycad are among the more outstanding specimens to be



collected. The wood occurs in float and in place as large buried logs. Many specimens have been identified leading to the conclusion that the region once hosted a sub-tropical forest of palms, tree ferns and cycads.

The original discoverers chose to keep the area "secret" and share it only with friends. Many trips were made and a great deal of fine wood specimens collected before the weather became too hot. As soon as the weather cooled a bit, the discoverers returned to their virgin gem field after an absence of only three

months. Much to their dismay, they found their "secret" had not been kept. Many people had been willing to brave a Death Valley summer in order to obtain some fine wood specimens. Considerable float material was gone and gaping holes revealed where logs had once been.

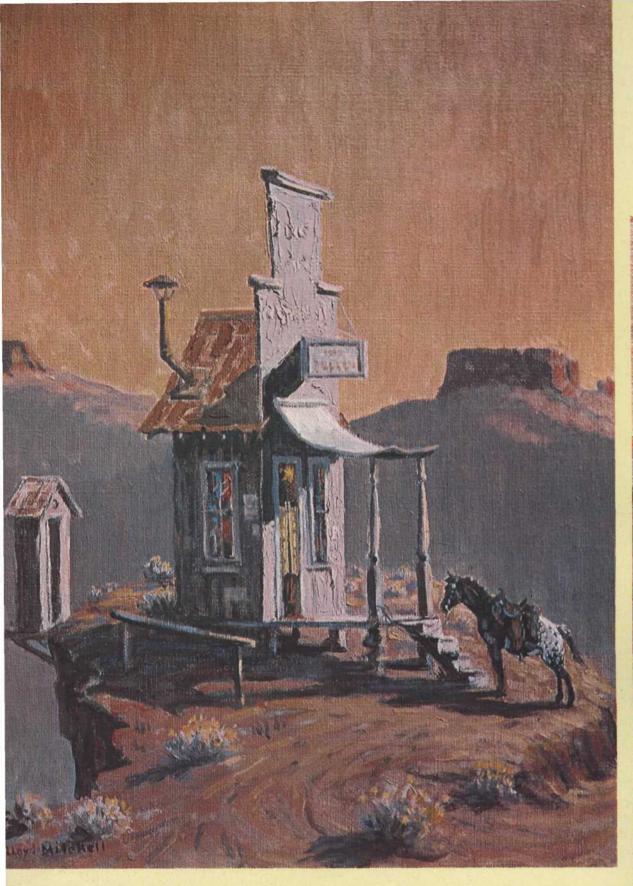
Though it was too late to do anything about the ravaging which had taken place, the group decided they now wished to share their find with other collectors. Mrs. Aileen McKinney, one of the discoverers, provided me with the

facts for a short article which appeared in the January, 1958 issue of Gems & Minerals Magazine.

"Secret locations" cannot remain secret if more than one person, or a man and wife, know about it. It seems obvious in this case that "leaks" had reached the ears of side-pocket dealers and rock hogs who proceeded to go in and high-grade the field. I, too, had been shown specimens and told enough about it to have a good idea of its location.

After 18 years of collecting, good

Continued on Page 46



Lost Horizon 20"x16"

WESTERN ART

Buffalo Country, 18"x24"

LLO

yd Mitchell

OMBSTONE MAY be a long way from Temple City,
California, but the West still lives in the studio of Lloyd Mitchell on Las Tunas Drive. Mitchell is one of the foremost Western painters and his studio is packed with canvasses of cowboys, Indians, saloons and wild horses.





Motherly Love 18''x24''

Raised in the Van Buren-Fort Smith area of Arkansas, near the border of Oklahoma and adjacent to the Cherokee Indian territory, Lloyd was immersed in the lore of the Old West at an early age. Leaving home at the age of 16 to see what he could of the world, his first job, at \$30 a month, was on the big Sherman Ranch in western Kansas. From there he drifted on to Wyoming where he worked for a horse ranch in the vicinity of Rock Eagle located in the Goshin Hole country. In the 1930s, Mitchell ended up in Hollywood working, appropriately, as a bit player in Westerns and associated with such cowboy stars as Tom Mix, Bob Steel and Ken Maynard.

Joining the Navy during World War II, he attended Quartermaster school along with actor Henry Fonda at the U. S. Naval Base in San Diego, California. Lloyd can well be proud of the painting he still has that Fonda, who was also interested in art, posed for. While serving on a minesweeper, he

honed his drawing skills by sketching scenes of battles and shipboard life. Returning to Camp Elliot after two years of sea duty, he was assigned to paint a portrait of Commodore Scanlin. Free time was spent doing many portraits of sailors and their wives and girl friends from photographs.

In addition to receiving art training at Chounard's Art Institute in Los Angeles, Lloyd has also studied and painted with many famous California artists including Will Foster, Einar Hansen, Sam Hyde Harris, Trude Hanscom and Robert Frame. He estimates he has painted over two thousand pictures, of which many are hanging in various galleries across the country. His works are represented in many private art collections including that of Mrs. Jimmy Swinnerton of Palm Desert. California.

One of his prize works hung in Governor Ronald Reagan's office in Sacramento. Explaining how it arrived there, Mitchell said that he had entered the painting, "The Country Store," in the outdoor Los Angeles Art Festival in Barnsdall Park and won a purchase award. The painting went into the Ahmanson Collection where Mrs. Nancy Reagan saw it and



Outlaw Tamer 20''x24''

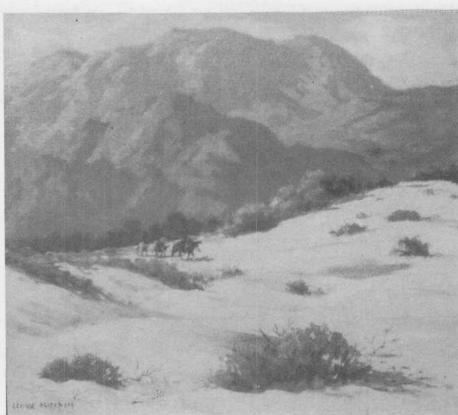


Lloyd Mitchell AICA Member

requested that it be used to decorate the Reagans' new home. The Governor picked it for his office because he likes Western art.

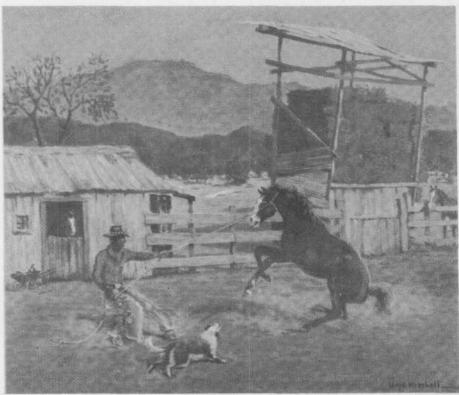
Mitchell's art can also be seen in prints and greeting cards, produced by the Leanin' Tree, Boulder, Colorado, printers of fine Western art. One of the more popular series is the "Skinny Saloon" which can be seen in card and gift shops nationwide.

Lloyd is a member of the Westerners, Los Angeles Corral,

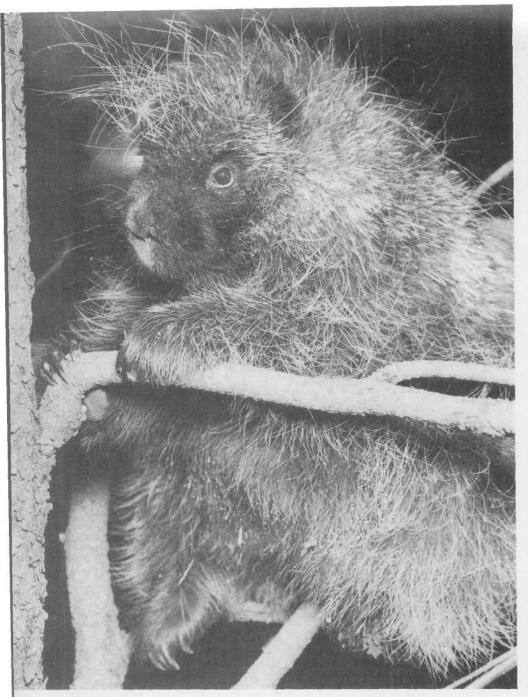


an organization of men with the common interest for the research and preservation of Western history, and also belongs to the American Indian and Cowboy Artists Society.

Encouraged by his lovely wife, Donna, Lloyd continues to preserve the West on canvas and his works are represented in many art galleries in Southern California including the Doris Gallery, Arcadia; Petersen Galleries, Beverly Hills; Metcalf Galleries, South Pasadena; Thackeray Gallery, San Diego; Taylor Ranch Gallery, Monterey Park and the Desert Magazine, Palm Desert



Saddleup Time 20''x24''



helping to save deer from starvation in times of heavy snow.

Nor does the porcupine offer much competition to fellow wildlife when it

The description of the save deer from starvation in times of heavy snow.

Nor does the porcupine offer much competition to fellow wildlife when it newcomer

ESIGNED BY nature to take life at a flat-footed waddle, the portly porcupine flourishes today even as of yore in the juniper-pinyon woodlands and mountain forests of the Southwest. Surprisingly, these animated pincushions are also being encountered with increasing frequency far out in the desert scrub in places that are many miles from the nearest treed areas.

For a child of the forests, open desert land is a very strange place to be. But there the porcupine is, padding serenely about his business through sage and mesquite-a sight to gladden the eye of the biologist who likes to think about what must take place physiologically and behavior-wise when members of a species push out into areas where conditions are anything but normal for them.

Not that the porcupine himself is any stranger to zoological investigation, there being many a learned paper written on this and that aspect and scattered through professional literature. Thanks now to the recent fine work of biologist Charles Woods, information delved out in the past and reports of research going on currently have been brought together. From this new consolidation of facts a mighty interesting animal emerges.

Basically the porcupine is a very solid character with the calm outlook of a citizen who, in making an honest living for himself, lets his fellow wildlife alone and in turn expects to be let alone himself. A strict vegetarian, he dines part of the year on the bark of trees and top twigs, food items not in heavy demand by other vegetarians. In fact, he even supplies some of the more earth-bound neighbors with branches he cuts and drops in his

by K. L. BOYNTON

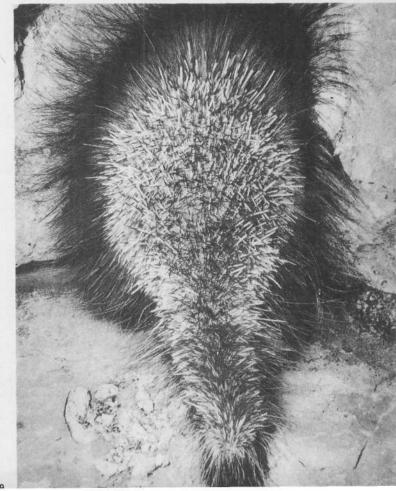


Opposite page: A porcupine high in a ponderosa pine in northern Arizona near Holbrook. Right: Caught by the camera in the entrance to his cave in Papago Springs, Arizona.

comes to picking out a home location. A den in a rock slide or in a fallen log or second-hand hole suits him fine, or for that matter a tree crotch or strong limb to sprawl out on serves equally well for sleeping. Nor is he a believer in territory maintenance and defense. Being a rover at heart, he does a lot of local traveling and sometimes makes treks of considerable distance depending on the weather, food conditions and the state of family affairs. The Southwest offers a particularly good travel opportunity since the desert, foothills and mountains - all such different habitats - lie so closely together the porcupine can shift his operational base with the season, and in accordance with specific conditions of the locality.

In Idaho and Utah, for instance, they migrate between pine-covered buttes for winter feeding to sagebrush for summer feeding grounds. In eastern Oregon, on the other hand, they clamber down from the rocky forests of the higher elevations to mountain meadows — those local openings in the forests — perhaps even wintering along the streams, going back up to the higher elevations when

Right: A rear view showing how the quills are raised in a bristling defense. Photos by George M. Bradt.



the green plants appear again there in the spring. Travel routes lie along ridges, down through draws, along brushy stream bottoms, picked for easy going. Not that the traveling porcupine is in any hurry. Heavy-set and shortlegged, he's not built to make time, and anyhow, some sort of food is always at hand, the menu varying naturally with the season.

In winter, the main staple is the inner bark of trees, rich in sugar and starch. Zoologist Ira Gabrielson's Oregon study showed that ponderosa pine, lodgepole, tamarack, spruce, fir, alder, aspen, all served as food as well as cottonwood and willow twigs and sagebrush bark. Summertime the diet is almost entirely herbaceous plants, geraniums, sedge, knotweed, berries, leaves and grass, the porcupine seemingly always willing to sample new items. Desert regions offer penstamen, prickly pear flowers, rabbit bush, willow bark, palo verde, paloferro and mesquite, annual flowers and grasses.

As apparent from his proportions, the stout porcupine is a good trencherman,

tucking away perhaps 430 grams of food per day. Now all this greenstuff requires special handling by interior machinery capable of making the most of the food content. Anatomists were naturally interested, among them Starrett, Dodge, Balows, Jennison, Johnson and McBee and from their various investigations it turns out that the porcupine has a gut some 8.5 meters long, 46 percent of which is small intestine, harboring some fine bacteria useful in decomposing plant cellulose. Also included in the equipment is a special system whereby fatty acids produced by fermentation can be absorbed directly into the blood, and a big liver acts to store vitamins. With a set-up like this and such a wide variety of vegetable food possible, the porcupine under normal circumstances has few grocery worries.

Enemy annoyances are few, too, covotes sometimes being brash enough to try for porcupine dinner, the main trouble coming from the fisher, a treegoing relative of the weasel who for some reason seems to know how to get through that marvelous defensive-offensive system afforded the porcupine by his quills.

A quill is actually a hair, modified into a different kind of structure. It has a bulb-like base, set in a pit. The guills grow out from their follicle-pits and are arranged in groups two to five mm apart in neat rows across the porcupine's body. The longest are on his rump, the shortest on his cheeks. When a guill reaches its full growth, nourishment is cut off, and it becomes a dead structure with less rootage. Hence it is easier to pull out. Lost quills are replaced by new ones growing out at some 1/2mm a day, it taking anywhere from two to eight months for a new quill to reach full length. Not that the time element is of much concern, since there are some 30,000 guills on the porcupine, anyhow.

When the porcupine is going peacefully about his business, the quills lie flat among the long guard hairs of his coat. But they can be jerked erect by muscular action to make a thick wall of tall spikes. Needle sharp, many of the guills are also barbed, having a scaled surface maybe two-thirds of the way back from the tip and these are the ones that can cause the most damage. Take those 1,600 barbed spikes in the tail, for instance, which appendage the porcupine uses as a flailweapon. Tucking his head down and out of the way, he presents his spiked rump to the enemy, and backing suddenly forces his erect quills against the enemy's body. The old tail, flailing about at the same time, drives in its sharp spines. Many guills are left in the enemy and, held securely by their barbs, will be drawn deeper and deeper in by the victim's own muscle action. Lodged in the right places, the embeddd quills can be fatal.

Such encounters are probably few, a porcupine bristling with spikes and obviously ready for action being a most disheartening sight, one bound to discourage a predator from pursuing the matter further. The porcupine knows this and hence his leisurely pace in the conduct of his business, much of which is carried on upstairs, anyhow, since a tree can furnish both food and lodging. As is to be expected, he's an excellent climber. Not only does he have long claws, the bare soles of his hands and feet have rough bumps and hook-like surfaces, all contributing to a good grip. Climbing style is to hug the trunk of a tree, brace the



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tail, and pull up by extending one arm, then the other, bringing the hind feet up under the body. Zoologist Batchelder, watching one climb, noted the easy strong rhythm of the action, steady and sure up to the very top of the tree, out onto the swaying, dipping topmost branches, where the animal with astonishing balance proceeded to dine of the very end twigs.

With a life style like this, porcupines are mostly solitary except of course, during the social season which in the West opens along about August and September. At this time the gentlemen, particularly, seem to make up for their uncommunicative days as bachelors, for porcupine wooing seems to involve no end of sound effects. They have the repertoire for it, ranging from whines, moans, grunts, sniffs, squeaks, sobs, snorts, wails and squalls, and much teeth chattering. Just which of these are serenades to win a lady being unknown to researchers, or for that matter what other sounds may mean. One zoologist reported hearing "o deahp! o deahp" from his garden one night which sounded like a person bemoaning a sad situation and which, when he investigated, turned out to be a porcupine apparently enjoying what it was eating.

In any event, the wooing successful, gestation takes 210 days which is a surprising seven months, the youngster being born April to June, as late as July in Oregon's higher elevations. Only one offspring is the rule, the porcupette weighing about one pound. Precocious is the word, since young arrivals are born with their eyes open, their big front teeth already in and tucked in among the black coat hairs are guills. Soft at first, the quills harden within an hour, and the newborn youngster already knows how to defend itself.

Interesting enough, while the youngster can climb almost immediately, it usually remains on the ground — hidden in a rocky den or old log or brush pile for the first few days while Mama does the climbing and may stay up a nearby tree most of the time. The two are in communication, however, Mrs. P. clambering down from time to time for milk delivery. Important now are succulent herbs and tender browse for the little porcupette and this being the good time of the year, the mountain meadows and juniper-pinyon woodlands provide well, the youngster stuffing itself on greens a week or two after birth. Besides learning what is good to eat, the youngster must also learn to climb well. Fumbly at first, with tentative tries and near slips, it progresses slowly but as the days pass the old inherited climbing skill begins to assert itself, and in no time at all, the youngster is as at home in a tree as on the ground.

In the woodland-montane forests of the Southwest, the porcupine has a role to play. His cutting and trimming of upper branches lets the sunshine through to the forest floor promoting seedling growth - the trees of the future. It also enables a greater variety of plants to grow and to enrich the land. True, his eating of top twigs of a tree if carried too far, changes its growth pattern. This interferes with the plans of man who, firmly convinced that everything in the universe belongs exclusively to him, wishes the tree to grow big and tall so that he can cut it down for himself. Running amuck of man's interest, of course, bodes ill for the porcupine's future.

Moving out into the desert scrub, as it is apparently doing, may be the answer of a tribe that has weathered all sorts of conditions for some 10 million years. Here in the desert there is food to be had, rocky places for dens, sometimes willows along watercourses, or even out in the most uninhabitable and hot places maybe an acacia to climb in, as zoologist Reynolds reports, the porcupine in this case being sound asleep in a fork on one some 10 feet off the ground.

Being slow by nature, his tempo is right for desert living and energy conservation, his coat of guard hairs and quills a fine insulation against the sun's radiation, a protection in turn against cold. And his interior machinery, as one and all know, quite capable of handling this different desert fare. Best of all, there is little in the uninhabited and hot sections of the desert that man wants for the moment.

Hence biologists are watching with interest the course of porcupine events and privately betting that this stout old rodent with the independent ways will succeed in this new phase of his life.

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THURSDAY, NOVEMBER 6

7:30 A.M.—Death Valley Hike. Hikers will start near Hole-In-The-Rock Spring and camp overnight near Sand Dunes picnic area. Following the old supply road and Rhyolite-Skidoo telegraph line, hikers will arrive at Stovepipe Wells at 1:30 P.M. Friday.

7:00 P.M.—Naturalist Talk. At the Museum and Visitor Center Auditorium, Furnace Creek

7:30 P.M.—Campfire across from Stovepipe Wells Village. Matt Ryan will tell us about "People and Things That Happened to Me in Death Valley." Charlie Seemann, a professional folklorist, will sing and play songs of the Old West and desert sands. Join in the traditional songfest featuring patriotic songs.

9:00 P.M.—11:00 P.M.—Dancing Under the Stars at Stovepipe Wells Village. Enjoy Modern-Social dancing to toe-tapping music.

FRIDAY, NOVEMBER 7

6:00 A.M.—Rise Early . . . Meet for a Sand Dunes Photo Shoot. (Take road to Sand Dunes Picnic area—watch for sign on Highway 190 east of Stovepipe Wells.) Techniques of Sand Dunes Photography with props and models. Coffee and donuts. Bring camera and plenty of film.

8:00—Historical Breakfast. Stovepipe Wells Village. "The Women of Death Valley" will be the topic of this year's historical gathering. It may have been the men who won the West, but the women tamed it. A panel of women, familiar with the Death Valley region, will regale us with anecdotes of the early days. Superintendent Jim Thompson will also reveal "Doubtful Death Valley Facts."

8:00 A.M.—Hootenany Breakfast. Furnace Creek Golf Course. For the seventh year our performers will be in tiptop shape for an old fashion Hootenany Hoedown. Featured will be Aim Morhardt, John Hilton, the Reinsmen, Charlie Seemann, Wait Larvae, plus a few surprises.

10:30 A.M.—Conducted Tour. Tour to Ubehebe Crater, Scotty's Castle and North End points. Starts at sign on main road north of Visitor Center. Your car.

11:45 A.M.—Bi-Centennial Event. The Death Valley Drum & Bugle Corps. Entrance Furnance Creek Ranch.

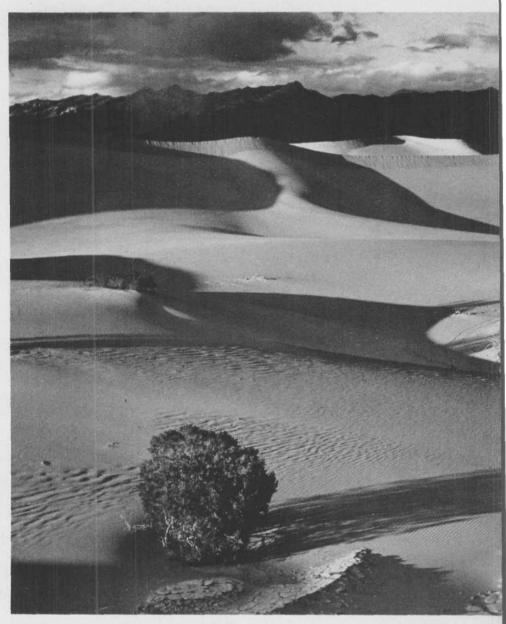
12:00 NOON—Arrival of Riders . . . 5th Annual Desert trek at Blacksmith Shop, Stovepipe Wells Village. Riders will leave Indian Wells and Trona treking over the Slate Range into Panamint Valley. The 2nd day they'll ride through the Big Horn Sheep country of Goler Wash, through Butte Valley, to a bivouac in Anvil Spring Canyon. Other campsites are at the Eagle Borax ruins, Devil's Speedway and Pupfish Springs. Their noon arrival is an exciting event providing

many photographic opportunities.

12:30 P.M.—Arrival of Pony-drawn covered wagons at entrance to Furnace Creek Ranch. Pony-drawn covered wagons will again roll into Furnace Creek Ranch for the 9th year. These covered wagons will travel 50 miles in 5 days, starting at Ashford Junction, passing the site of Eagle Borax Works . . . into Furnace Creek by way of the west road. The self-contained wagons will be home for riders ranging from 8 to 80 years of age.

1:00 P.M.—Bi-Centennial Event at entrance to Furnace Creek Ranch. The Death Valley Drum and Bugle Corps.

1:30 P.M.—Arrival of Death Valley Hikers at Stovepipe Wells Village from their overnight base camp on the Sand Dunes.



1:30 P.M.—Arrival of Riders of the 14th Death Valley Trail Ride at entrance to Furnace Creek Ranch. One hundred riders will cover the 125-mile historic and scenic route from Ridge-crest by way of Indian Wells Valley to Death Valley. Much of the ride will follow the famed 20 Mule Team Borax Wagon route.

7:00 P.M.—Naturalist Talk. Museum and Visitor Center Auditorium, Furnace Creek Ranch.

7:30 P.M.—Campfire across from Stovepipe Wells Village. Featuring Brief tales about Death Valley history . . . desert songfest led by Bill Newbro accompanied by Ruth Anderson . . . other musical entertainment including a preview of Saturday's Bluegrass and Traditional 5-string banjo convention. All fiddlers and banjoists are invited to warm up at the campfire.

7:30 P.M.—Campfire at Texas Springs. Our venerable Captain Gibson, former mule skinner and station agent on the Tonopah and Tidewater R.R. will regale us with a few anecdotes of early days in and around Death Valley. The popular

Reinsmen and folklorist singer Charlie Seemann will entertain us with western and desert songs. Superintendent Jim Thompson will disclose some "Doubtful Death Valley Facts."

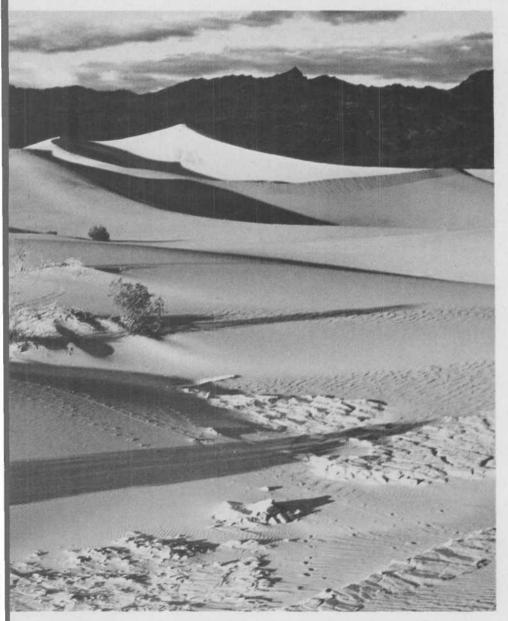
9:00 P.M.—11:00 P.M.—Dancing Under the Stars at Stovepipe Wells Village (Modern-Social) 9:00 P.M.—11:00 P.M.—Square Dancing Under the Stars, Furnace Creek Ranch near the Pool. Square dance under the stars to the calling of Darrell Marsh of Bishop. Fun level dance. Spectators and dancers will enjoy Darrell's calling.

SATURDAY, NOVEMBER 8

8:00—Photographer's Breakfast at Stovepipe Wells Village. In this Bi-Centennial Year, re-discover America and hear about the fascinating behind-the-scenes events that occurred during the filming of Eastman Kodak's Bi-Centennial Spectacular Show—PROFILE '76. Meet the men who produced the show.

8:00A.M.—Authors' Breakfast, Furnace Creek Golf Course. Featured speaker will be Ray Allen

ENCAMPMENT PROGRAM



Billington, giving us a fascinating look at the American Southwest as it was viewed by Europeans a century or more ago. A distinguished historian and author of many books on the frontier, Ray Billington was the first President of the Western History Association. The Fred Harvey Company will display current desert and western books. You can meet personally with Western and Desert Authors who will be on hand to autograph your books. Music by the Reinsmen.

Hiking events. Two interesting desert hikes are designed to give a new sense of values about Death Valley—visiting locales rarely seen by tourists. The walks are not strenuous. Hiking boots, full canteen, and sack lunch are required. A broad-brimmed hat is recommended. Transportation will be pooled.

8:30 A.M.—Encampment Hike Salt Creek Traverse. The 6-mile hike passes through the south end of the Devill's Cornfield, follows the course of Salt Creek—with its below sea-level water fall, migratory waterfowl and desert pup-

fish. Meet on State Highway 190 at Devil's Cornfield where car shuttle will be arranged. Bring canteen, lunch and stout shoes.

10:00 A.M.—Conducted Tour. Dr. Thomas Clements, Conductor. Middle part of the Valley. Starts at sign on main road, north of Visitor Center, ending at Stovepipe Wells Village in time for the Chuck Wagon lunch. Your car.

10:15 A.M.—Bi-Centennial Event at entrance to Furnace Creek Ranch. The Death Valley Drum & Bugle Corps.

11:00 A.M.—The Tombstone Players, Stovepipe Wells Village. This famous group of actors right out of the Old West will entertain you before the Chuck Wagon Lunch.

12:00 NOON—Chuck Wagon Lunch—Stovepipe Wells Village, served Western Style from an authentic Chuck Wagon.

2:00 P.M.—Burro Flapjack Sweepstakes, Stovepipe Wells Village Area. A dozen and one-half prospectors, as stubborn as their burros, compete in an unique, hilarious race of man and beast. Around a center pole they go! Pushing, Sand Dunes near Stovepipe Wells, Death Valley. Photo by John Meyerpeter of Bishop, California.

pulling, hootin' 'n hollerin', even carrying the burro if need be! The first burro to eat a flapjack determines the winner.

7:00 P.M.—Naturalist Talk, Museum and Visitor Center Auditourim.

7:30—8:30 P.M.—The Tombstone Players, Stovepipe Wells Village. A one-hour show about the American West with live actors.

7:15 P.M.—Evening Assembly. Park Area, north of Golf Course Road, Furnace Creek Ranch. Bring your own chair. Eastman Kodak's Bi-Centennial Spectacular sight and sound show—PROFILE '76. Wide screen panoramas will melt into multiple-imaged montages and action-packed movies as Kodak gives us scenery, incidents and people of our Bi-Centennial America.

8:30 P.M.—New Event . . . Desert Banjo Convention at Stovepipe Wells Village. Featuring the best plinker plunkers of both Bluegrass and Traditional 5-string banjos competing for trophies and cash prizes.

8:30 P.M.—12th Annual Old Fashioned Fiddlers' Contest. Follows Evening Assembly at same location. The best Fiddlers in the West will compete for cash prizes and trophies. Conducted by Ardis Walker and Dick Hilleary.

9:00 P.M.—11:00 P.M.—Square Dancing Under the Stars. Furnace Creek Ranch near the pool. Another fun level square dance called by Darrell Marsh. Everyone welcome.

SUNDAY, NOVEMBER 9

7:00 A.M.—Prostestant Sunrise Service, Desolation Canyon. Services by Christian Ministery in National Park.

8:00 A.M.— Catholic Mass. Visitor Center Auditorium. Services by Father Raymond Duffy.

8:30 A.M. Encampment Hike . . . Gower Gulch to Valley Floor. This 2½-mile walk starts down Gower Gulch, near Manly Beacon, past old borax ratholes and into Golden Canyon, eventually winding up on the Badwater highway. Assembly at bottom of hill below Zabriskie Point overlook, with canteen, brunch and stout shoes. 8:30A.M.—Artists' Breakfast, Furnace Creek Golf Course. Watch the creation of a new west-

Golf Course. Watch the creation of a new western painting by leading western artists. View the development of a portrait of a prominent '49er by Leslie B. DeMille. Join in the fun and spirited bidding for the western painting, begun at last year's breakfast, to be auctioned off to the highest bidder. Entertainment by the Reinsmen and a few of the more vocal artists. (Please bring your own chairs to this breakfast.)

10:30 A.M.—Conducted Tour. Park Naturalist conducting. Tour to South Valley points. Starts at sign on main road, north of Visitor Center, your car.

11:00 A.M.—The Tombstone Players, Stovepipe Wells Village.

7:00 P.M.—Naturalist Talk. Museum and Visitor Center Auditorium.

SPECIAL EVENTS

Desert Art Show, Museum and Visitor Center. An Invitational and Open Show featuring noted and typical desert art. You can vote for your favorite oil, watercolor and sculpture. Opens 10:15 A.M. Thursday, November 6 and continues through Sunday, November 9. Sunday hours will be from 10:30 A.M. to 12 Noon only.

Borax Museum, Furnace Creek Ranch. Be sure to visit the Borax Museum where you can enjoy viewing an extensive borax mineral display and early day artifacts of the Death Valley Area.

Desert/November 1975





Above: A winter scene in Mono Lake country.
Left: Grave of R. H. Mason.
Mrs. Mason miraculously survived the avalanche.

AVALANCHE ON COPPER MOUNTAIN

by ROGER MITCHELL

T HAD BEEN a bad winter, that winter of 1910-1911. Records amounts of snow had fallen in the Sierra. On a flat below 9,468-foot Copper Mountain in Eastern California's Mono County, the turbines and generators of the Mill Creek Power Plant hummed a steady tune. The man standing the night watch over the dials and gauges of the plant's main switchboard probably threw another log in the stove and wondered how long the blizzard raging outside would continue. Nearby in the employees' quarters seven others slumbered unaware of the terrible event about to happen.

Thus it was at 12:01 a.m. on March 7, 1911 when suddenly, without warning, the snow on the east face of Copper Mountain gave way, rushing down the mountainside in a huge avalanche. The Mill Creek Power Plant and its sleeping inhabitants were right in the path of a million tons of tumbling snow. There would be seven who never knew what hit them, but miraculously, one would survive.

The outside world did not know of the disaster immediately. True, the electricity in the mining camps of Bodie, Aurora, and Luck Boy suddenly went off at 12:01 a.m., but that could be simply a line down anywhere in that lonely California-Nevada border country. The telephone lines had already broken under the weight of heavy snows.

As dawn tried to break through the wintery storm clouds, the snow continued to fall and the wind continued to blow. Visibility was poor and the disaster would not be discovered for many hours. When the storm abated, the fate of the power plant was obvious. Where once had been four cottages and a concrete-housed power plant, nothing remained but a jumbled chaos of snow and debris. The avalanche left a path of destruction a mile long and a half mile wide. Generators and other machinery weighing tons were torn from their cement foundations and moved 500 feet downslope.

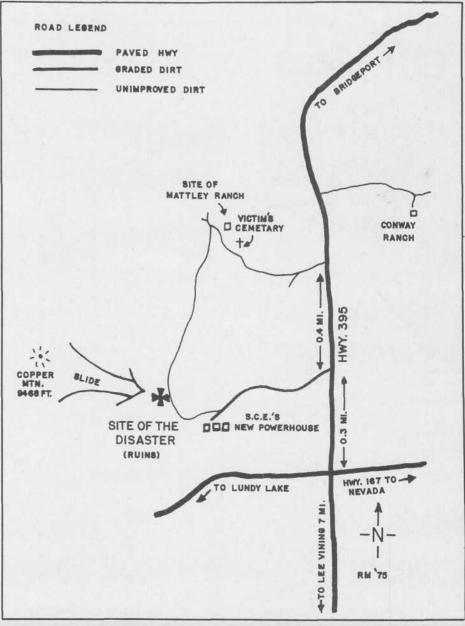
The word went out and soon rescue teams came in on skis and snowshoes from the nearby ranches. The Conway and Mattley Ranches served as headquarters for the search operation, keeping the men supplied with plenty of hot coffee and food as they probed through the snow in sub-freezing temperatures. One body was found and then another and another. The worst was feared.

It was a dog's whimper that gave the rescue crews renewed hope. Digging frantically through the splintered wood which once had been cabin #1 they found a large steamer trunk was partially supporting a section of wall which had fallen over on the bed. Beneath the wall was the body of R.H. Mason. Next to him was his wife, Agnes and their dog, both miraculously alive, thanks to that steamer trunk. After being extricated from the wreckage, Mrs. Mason was quickly evacuated to the nearby Conway Ranch, and from there taken by toboggan to the hospital in Bodie. She eventually lost a leg due to gangrene, but otherwise made a full recovery.

found and transported to the Mattley Ranch. They had to be stored there a few weeks until the roads were reopened and coffins could be brought in. Then, too, the task of digging seven graves was a slow process because the ground was frozen solid. Finally a priest came in and the victims received a proper funeral and burial with people from all over Mono County attending.

The Mattley Ranch is long gone, its site marked only by the bleached skeletons of cottonwood trees. The graves remain, however, on a lonely hillside overlooking the scene of the disaster. Every now and then an old-timer from the area drops a flower or two on the seven mounds.

The site of the tragedy seldom has visitors today, yet only a mile away The bodies of all seven victims were hundreds of thousands drive by each



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year. Perhaps more would stop if they knew, but the story of the Copper Mountain avalanche is one of those brief moments in Western history which historians appear to think too insignificant to record for posterity. While the area is at an elevation of 7,000 feet, it is usually accessible all year around. Only after an occasional winter storm are the dirt roads impassable, and then usually only for a week or two.

To make a short loop trip through the area, take U.S. Highway 395 to a point where it intersects with State Route 167, some seven miles north of Lee Vining, California. Continue north on 395 and after 0.3 miles you will see a road on the left going to the new power plant, now operated by Southern California Edison Company. Do not turn (our loop trip ends here) but continue north on the highway another 0.4 miles. Turn left on the dirt road which goes down the embankment and through the unlocked gate in the highway right-of-way fence. After crossing the remains of the old highway, follow the dirt road as it winds its way westward through the sagebrush. Although vegetation has grown up between the tracks, the dirt road can be easily negotiated by standard automobiles. By keeping to the right you will come to a small wooden bridge spanning an irrigation ditch. This is 0.7 miles from the highway. Cross the bridge and park. This is the site of the old Mattley Ranch, Look for a faint trail heading east to the cemetery about 100 yards away.

Each of the seven graves is marked with a piece of gray-white marble reclaimed from what had been the power-plant switchboard. This stone panel once held all of the plant's meters and controls, but like everything else in that building, it was torn to pieces.

To visit the site of the old power plant itself, follow the dirt road to the extreme left at the Mattley Ranch site. It heads back south paralleling the west side of the irrigation ditch. It is 0.9 miles to the site. Today, most of the debris is cleaned up but the site is still marked by concrete foundations and the remains of sections of huge steel pipes once part of the plant's penstock.

To get back to Highway 395 continue following the dirt road which turns east. Within 0.4 miles you will come on SCE's graded road and power plant. The main highway is but 0.6 miles beyond.

Desert Plant Life

by JIM CORNETT



ATCH OUT for the jumping cholla. The long, stiff spines of this cactus can penetrate deeply into human flesh. Each spine is covered with microscopic, backward pointing scales which make removal very difficult.

A friend and I were once hiking amongst a "garden" of these gregarious plants when one of the spiny, ball-like segments of the cholla affixed itself to the toe of his boot. As he walked a few steps further, he accidentally rammed the segment into the back of his calf. A newcomer to the desert, my friend first thought he had been bitten by a rattlesnake, but as we inspected his leg I saw the large "cholla ball" imbedded in his skin. Wrapping a large cloth bag around the segment, I pulled firmly while watching his skin stretch grotesquely away from his calf. Finally, the cholla ball popped free and left my friend with a sore leg and burning sensation around the wound. Many of the spines had to be pulled out later at camp.

The spiny balls of the jumping cholla, *Opuntia Bigelovii*, are the means of reproducing for this perennial. Apparently the seeds are infertile and the cholla relies upon the easily broken-off segments for propagation. The balls can be either rolled some distance by wind or

water, or attach themselves to an animal and be transported around in that manner.

Jumping chollas are found usually at elevations below 3000 feet on alluvial fans or slopes. They range from the Mojave Desert of California and Nevada, through Arizona into Mexico.

Opuntia Bigelovii may reach heights in excess of five feet and is entirely covered with white or yellowish spines. The base of the cactus may be brown due to the dead joints and trunk. The flowers appear in spring and are green or yellowish-green.

The jumping cholla is well utilized by desert animals even if man has shown little interest. Wood rats carry the spiny segments back to their nest and deposit them near the entrance to their home. This deters the wood rat's enemies from entering his domicile. The cactus wren not infrequently constructs her nest in the prickly branches. Primitive man may have utilized the green fruits for food but apparently not to any great extent. Fruits of the other members of this genus, however, were often used as food.



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DEATH VALLEY, CALIFORNIA

Desert/November 1975

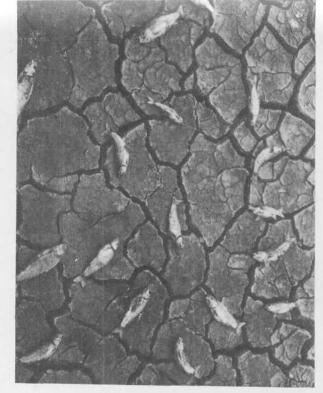
HERE ARE many trails to Death Valley, most of which played a part in the area's turbulent past. Each has its own particular scenic and geological features. And although Nature, with man's assistance, has erased a number of the old trails, there are still some remaining that will provide exciting journeys into the past for those who will seek them out.

From an historical viewpoint, the Old Spanish Trail was probably the most important trail to enter the Death Valley region. Beginning in 1829, as a trade route between Santa Fe and Southern California, it was thrust into prominence in 1849 when Captain Hunt agreed to guide 500 travelers from Salt Lake City over it to Southern California. The caravan joined the Old Spanish Trail near Parawan, Utah and had hardly started westward when discord arose within its ranks.

Many of the travelers were bound for the newly discovered gold fields in California and were impatient over the delay in getting there. One of the group had a map which he claimed showed a 500-mile-saving cutoff and succeeded in convincing most of the travelers that it was the best route. Captain Hunt had traveled over the Old Spanish Trail three times previously and refused to change his course. The dissenters broke away from the caravan near Enterprise, Utah, forming the ill-fated Death Valley Party about which volumes have been written. Captain Hunt's group arrived at their destination without further trouble.

After leaving Southern Utah near St. George, the Old Spanish Trail followed a route to Las Vegas about parallel with the present U.S. Highway 91. From Las Vegas the trail led successively to Mountain Springs, Stump Springs, and Resting Springs, then down Amargosa River Canyon to Salt Creek. From Salt Creek it proceeded south to Silver Dry Lake, then veered southwest through Red Pass to Bitter Spring. The 60-mile, waterless stretch of trail between Resting Spring and Bitter Spring was often called "Jornado del Muerto," a designation with an ominous meaning for travelers who failed to replenish their supply of water at Resting Spring.

The water at Bitter Spring was just what its name implied, but gratefully accepted when the alternative, possible death from thirst, was considered.





Above: Coyote Well in 1907. Right: Adrian Egbert advertises his wares at Cave Springs.

Above: Remains of fish washed down by storm waters from fish hatcheries in the San Bernardino Mountains to the Mojave River and on to Soda Lake. Right: A one woman operation. Grace Finley dug out enough ore to fill the bucket, climbed out of the shaft, then pulled the bucket to the surface with an arrangement of pulleys.



In addition to anxiety over lack of water, early-day travelers along the Old Spanish Trail had the possibility of attacks from bands of Paiute Indians to add to their worries. While traveling eastward from a government exploring expedition in April 1844, Captain John C. Fremont reported meeting a man and a boy at Bitter Spring who were the only survivors of a group of traders massacred a few days before at Resting Springs. The traders were returning to New Mexico with a large number of horses they obtained in California. When the party was attacked the two survivors were away from camp attending the horses and managed to flee westward with some of them. The Indians caught up with them near Bitter Spring. The

survivors escaped again, but without the horses. When Kit Carson, the famous scout who was traveling with Fremont, heard their story he decided to regain the horses. With a single companion he traced the Indians to Garlic Spring where they were preparing a feast of horse meat. The scouts waited for nightfall, then yelling wildly they charged upon the camp. The surprised Indians scattered in panic, leaving two dead behind. The scouts, unhurt, rounded up the horses and returned to Bitter Spring. When commenting on the event Captain Fremont stated that Carson's success against such tremendous odds was undoubtedly the boldest venture of the noted scout's entire career.

On my first attempt to reach Bitter





Death Valley

Spring in 1935, I made a wrong turn at Barstow and to correct my error I tried to cross the Mojave River bed near Daggett. I learned quickly why it was called the "Upside-down" river. Beneath its seemingly dry upper surface lay a wet, spongy mass into which my car sank up to its hubcaps. I walked to a nearby ranch for help, which to my surprise was the home of Dix Van Dyke, noted historian of the Mojave Desert. He invited me inside to cool off while two of his ranch hands got my car back on solid ground, and although I intended to make my visit a short one, I became so engrossed in his Western library, old maps and photographs, that time slipped by unnoticed until it was too late to continue on to Bitter Springs.

Van Dyke, born in San Diego, moved to Dagget with his father in 1901. He was appointed Justice of Peace for Daggett Township in 1923, a position he held up to a few months before he passed away in 1951. He spent 50 years recording the history of the Mojave Desert, retracing old trails, and rediscovering forgotten campgrounds and water holes used by ox-drawn caravans over a century ago.

In 1907 Dix was hired to haul two tons of liquor and food to a tent city called "Crackerjack" located on the slope of

by WALTER FORD

Avawatz Mountains a few miles Southeast of Cave Springs. Encouraged by anticipated activity of surrounding mines. the new town arose almost overnight. Streets were laid out, lots sold, and a saloon and store were added to complete the image of a prosperous mining camp. A stage line from Silver Dry Lake began operations. The Tonopah and Tidewater Railroad made a survey for a branch line from Silver Dry Lake. And not to be outdone, the Santa Fe Railroad listed Crackerjack on its timetable. But neither of the proposed branch lines got beyond the planning stage. The mining boom did not materialize and Crackerjack became a canvas ghost town almost as quickly as it began.

An alternate route for the section of the Old Spanish Trail between Salt Creek and Bitter Spring was opened about 1870, and because it was the preferred route it became known as the "Immigrant Trail." The new trail turned westward from Salt Creek, then headed south over an easy grade to Cave Springs where there was a plentiful supply of cool, sweet water. From Cave Springs the trail led southwest and diagonally through what is now Fort Irwin Military Reservation, and on to Barstow. After the flow of covered-wagon immigrants

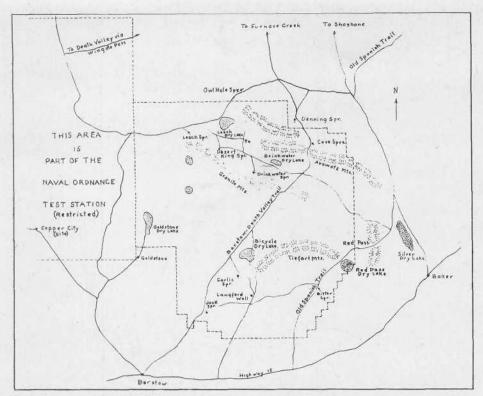
tapered down, the road was used mainly by prospectors traveling to and from Death Valley and was called the "Barstow-Death Valley Trail."

Around 1920, Adrian Egbert, a long-time prospector on the Mojave Desert, set up a stock of provisions at Cave Springs and hewed out sleeping rooms in its rocky walls for wayfarers along the trails. And to aid travelers in need of water he maintained filled gallon jugs protected by wood cases near their routes. It was a lonely land where a motorist in trouble might wait several days before help arrived.

I met Adrian Egbert for the first time in 1936 when I drove from Saratoga Springs with a friend. We were preparing to leave after an interesting visit when two boys of high school age staggered in and asked for water. "Where is the empty jug?" Egbert demanded. "I left it there," one replied. "Well, young man," Egbert shouted, "you will not get a drop of water until that jug is returned!" Sensing the boys' condition, I suggested that I drive back and get the jug, but Egbert would not agree. "If they are going to learn the ways of the desert," he said, "they had better begin now." Since we had a reserve supply of water we decided to take the boys back to their car, then drive behind them until they reached Barstow. Our decision displeased Egbert. "Get out!" he roared as we drove away, "and don't come back."

After visiting Owl Hole Spring several months later, we started homeward over the Barstow-Death Valley Trail. When we got near Cave Springs we saw Egbert intently watching our approach and upon arrival we learned we were the first travelers to come by in five days. Egbert was low in food supplies and his car battery was dead. His car was near an incline, so it was easy to get it started by placing it in gear and rolling forward. He was profuse with thanks for the simple operation and invited us to be his guests anytime we were out that way again. He did not mention our previous disagreement over the water jug, then or during the many times we saw him afterward.

While I was at Cave Springs one day the unpredictable Death Valley Scotty drove up and during our conversation he told me he never told a "dude" the truth. Shortly after he advised me to go down to Silver Dry Lake and see the



Map showing main trails through the area before Fort Irwin Military Reservation was established. Broken lines show approximate boundaries of Fort Irwin and part of the Naval Ordnance Test Station. Trails extending southward joined various points along Highway 15.

"sight of a lifetime — fish leaping out of a normally dry lake bed." "Oldtimer," I thought, "I may be a dude to you, but I'm not falling for that yarn," and passed up his advice. I stopped at Silver Dry Lake several months later and found its surface strewn with dead fish, which, when alive were washed down from fish hatcheries in San Bernardino Mountains during heavy storms.

I asked Egbert once what desert dwellers meant by the term "dude," and for readers who might covet that title, here is his reply: "Most of them are city 'skates' who wear fancy duds, travel in new cars, and squeal with misery over trivial discomforts old-timers never heed."

During spring of 1939 I told Egbert about the dazzling display of wildflowers along the Barstow-Death Valley Trail and added that I had never seen the desert more beautiful. "Don't let the old girl fool you," he warned, she is just displaying her gentle side now. Under summer sun she becomes a vicious old witch, ready to strike down the inexperienced, the unprepared travelers who enter her realm." His prophetic-like response became a reality about two months later.

Early in July, 1939, two men passed through Cave Springs on their way to inspect some manganese claims near Owl Hole Springs, about 20 miles below. Egbert told them it would be certain suicide to enter the furnace-like heat down there, but they brushed aside his objections and went on their way. From then on their actions followed the typical script of a desert summer tragedy. Inexperienced travelers, car stuck in sand, no water, attempted walk to safety which is seldom completed. About 12 o'clock that night one of the men crawled up to Cave Springs after a 13-hour struggle. His companion never made it.

The scanty remains of old Copper City lay about 15 miles east of Randsburg on the Death Valley road. While following that route on my way to Leach Dry Lake in 1939, I stopped at the old copper camp for water and found a young woman hard at work digging a trench. She said I was the only person she had seen in four days and seemed anxious to talk. I was willing to listen.

The prospector, Grace Finley, age 28, lost her job as a New York City telephone operator during the Depression of the 30's. She came to California and roamed the old mining camps, panning enough gold here and there to make a meager living. When I met her she had been at Copper City about two years. During that time she struck a three foot vein of high grade copper ore, which a geologist from a prominent smelting corporation

told her could lead to a fortune if it could be produced in large quantities. She was then sacking and selling the ore for \$19.00 a ton.

I wrote about Grace Finley's unusual occupation in the July, 1940 issue of Desert Magazine. A few months later two FBI agents called on her and said she was on Government property and ordered her to leave immediately. Despite the fact that she had staked the claim legally and had done the required assessment work. I did not hear from her again until after World War II, when she wrote that she was suing the Navy for loss of her property. She asked for some photographs I had taken to use as evidence of work performed, but I learned later that her claim was denied.

The last time I heard from the Copper City prospector was in 1964, when she wrote that she was happily married and living near San Bernardino, California. She enclosed a newspaper clipping that told of her winning a \$750.00 first prize award for a painting at a country-wide exhibition in Columbia, Missouri. Interestingly, the title of her painting, "Fire Hole in the Desert," was the same she applied to a vividly colored rocky basin near her Copper City home 25 years earlier.

It should be noted that sections of some trails mentioned in this article are presently within the boundaries of military reservations where public travel is prohibited. Trespassers are reported to the FBI and if their activities extend beyond mere trespassing they are prosecuted. A second violation, whether intentional or not, can also result in prosecution.

Camp Irwin has been operated for the Army by the National Guard since 1947. From time to time rumors of its closing have been heard, but so far they have proved groundless. Scenically and historically, the area would provide exceptional recreational opportunities for desert travelers, but if or when it will ever be available is presently only a matter for conjecture.

The Commander of Camp Irwin, Colonel Irving J. Taylor, told me that the boundaries are properly posted, but travelers going that way should supplement that information with an up-to-date road map of San Bernardino County, such as issued by the Automobile Club of Southern California.



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Rambling on Rocks

by GLENN and MARTHA VARGAS

GREEN GLASS: It Never [?[Is Obsidian

N PAST COLUMNS we have mentioned glass in the form of imitation or fake gems. The practice has been so common that we will devote next month's column to the subject. Also in the past, we have mentioned green glass being offered as obsidian. Since then, we have had a number of experiences in this connection that we would like to share with you.

First, a few words about obsidian might be in order. In reality, obsidian is glass. However, in relation to our usual concept of glass, obsidian is a highly impure glass. Stated simply, obsidian is a lava that has cooled so rapidly that no mineral crystals of visible size were able to form, and the mass solidified into a glass-like material. Most obsidians are opaque, perhaps showing slight translucency on thin edges. The color is usually black, but a reddish to brownish type is fairly common.

Seldom does obsidian come close to transparent. The one type that is transparent, or virtually so, is the material commonly known as "Apache Tears."

In spite of the above, which we believe to be correct, we have many times had our attention called to what someone thought was green obsidian. Invariably, the material was a fine green, and most

times the material was perfectly clear.

These we discussed in our June, 1973 column. The color of these is smoky or

grav.

The first of these instances took place at a gem show where an exhibitor was showing large faceted green gems. He insisted quite strongly that the material was obsidian, but could not show us a rough piece. He promised to send us some, but evidently never did.

Sometime later, another person wrote about a green obsidian. Further correspondence showed it to be from the same source. We did get a small piece, and were certain it was glass. Because of the insistence of the original exhibitor, we sent a portion of the piece to one of our gemologist friends.

He refused to do any more than look at the piece, and returned it with the comment that he followed a simple rule. "If the color is black, gray, or brown, it is obsidian. If it is any other color, it is glass."

We have great respect for our friend's opinions and ability, and so glass it was. We will, however, admit that his hard and fast rule was perhaps a bit unscientific. We discussed it with him later. He left the door open to us, or anyone else, to show him a piece of green obsidian, and prove it.

This is where we have found ourselves since that time. We have searched literature, museums, and talked to collectors. No green obsidian showed, except for one reference in a presently popular book. Discussion with the author revealed that he had taken another's word.

A few months ago, we thought we had finally come up with the answer. A friend of ours that is involved in mining gems in Africa gave us two pieces of green material that he stated was obsidian. One of them is very clear and flawless (again), and of a bluish-green color. The other is bright green, has some cracks, and what appeared to be bubbles. As obsidian does have bubbles, we were prone to accept the information, at least in part.

We fired questions at him, and received the following information. The material originated in Africa. There are

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16238 Lakewood Blvd. Bellflower, California 90706 two different locations where it is found, accounting for the two colors. He had personally visited one location, which was a large lava flow. He had supervised the gathering of large pieces, some as large as his head. These were presently being shipped here from Africa. We were promised that we would see them on arrival.

At this point, we were quietly revising our thinking, were ready to change our story, and report the finding of green obsidian. The information seemed to be



Firebrick is easily identified on the lower portion of this ''green obsidian'' specimen.

absolutely genuine and correct. We had two pieces furnished by a person that had been at the location of origin.

When we arrived home, we unpacked our two pieces of green obsidian and started to give them a good looking over. First, we found the small bubbles in the green piece were somewhat peculiar. They were almost perfect spheres, and not bubbles, but small globules of what appeared to be something metallic.

Obsidian does contain bubbles, but we have never seen any that even approached spherical. As most obsidian is cooling, it is flowing away from the volcano and any bubbles trapped in the molten mass are stretched in the direction of flow. All that we have seen were hollow.

Careful examination of the bluishgreen piece could not show us any type of inclusion. This in itself makes us suspicious of glass. One of our students was looking at it and called our attention to a mark on the surface. There, staring us in the face, was a typical mark as can be seen on any cast glass object. Our "green obsidian" suddenly became a remnant of some African glass utensil.

We wrote our informant, telling him of our findings and thinking. We suggested that he had done an excellent job of playing a practical joke on us, and offered our congratulations. His answer was the exact same story as before.

The shipment of pieces of "obsidian" had arrived and was on the docks of an American port. He would not be able to show them to us at that time because he was returning to Africa the next day. He promised to check the other "source" of obsidian that had the mold mark. He also promised to contact us again upon return to this country, but this has not as yet happened.

In our minds there is a very large question mark. Is there green obsidian in Africa? Regardless of what has recently taken place (and recounted above), there could be the possibility that such is the case. Many new and unheard of minerals have appeared in Africa. Nevertheless, we are doubtful of the obsidian, but are most willing to be shown.

Immediately following the above incidents, we received more green material. This time shown to us by none other than the Editor of *Desert!* A friend of his found a huge deposit of green material. It does sound familiar! In the deposit were chunks of clear pieces, and some rocks that had the green material clinging to them. Our Editor was asked (obviously) if it was green obsidian. We seriously wonder how these always get to us.

Presently we have the pieces in question. The piece of rock has perfectly parallel sides, and about one and one-eighth inches thick. One side has a glassy layer about one-eighth inch thick. The other side is covered by a fairly large mass of glassy material, some of it bright clear green. We have determined it to be fire brick, coated with glass.

We are certain that events went something like this. Somewhere there is a furnace that is used to make glass, or some other product that produces glass as a by-product. As with all furnaces, sooner or later, the fire brick lining starts to deteriorate, and must be replaced. The lining is there to keep whatever is being melted from adhering to the walls of the furnace. Removing a layer of fire brick is much easier than removing a layer of slag or other unwanted material.

When the lining of the furnace in

question deteriorated, it was removed and hauled away. We are not certain of the place of disposal, but feel it was dumped in the desert. No matter where, the fact remains that the pieces were picked up, and made their way to us.

Next month, we will get just a bit away from this subject, and discuss some of the instances when glass (other than green) has been used to imitate gems.



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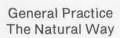
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AMARGOSA GORGE

Continued from Page 23

specimens can still be found at this location. You can't just bend over and pick them up; though I did just that on our last trip. Several days of collecting should produce some results. Fourwheel-drives can negotiate the many branches of upper Sperry Wash but plenty of ''shank's mare'' will be needed.

Stock cars and trailers can be taken into the collecting area via Tecopa. The country is broken, offering few level sites. Many campers park at the upper entrance of Sperry Wash Canyon but this is not the place to be during a storm.

The most exciting part of our back-country drive now begins as the road continues down Sperry Wash to a junction with Amargosa Gorge. You will find the many unusual geological formations exposed in the deep, wash-cut canyon fascinating. The road can be rough, if there have been summer thundershowers, but it is safe and negotiable though not advisable for trailers.

Originally Sperry Wash Road followed the canyon down to Amargosa River where it joined a desert trail through the Gorge. Travel north from this point required four-wheel-drive. The route south was not quite as sandy, crossed the river several times and had a few treacherous stretches. Some stock cars made it — more did not.

Today, 2.6 miles south of the upper entrance, a graded road leaves the wash and climbs into the hills that flank the eastern side of the Gorge. Beautiful chocolate-colored formations topped with white frosting and red-tan draperyeroded hills will be seen at their best, if it is late afternoon. Just over a mile from the wash, the road drops into the Gorge and joins the old railbed of the Tonopah-Tidewater. The latter now becomes the roadway.

Looking north, you can see concrete piers which once supported a trestle across Sperry Wash. A little farther north, easily visible, is a fence crossing the Gorge. It is the southern Boundary of "Closed Area 17, Amargosa Canyon."

Under the California Desert Vehicular Program being directed by the Bureau of Land Management, the northern half of Amargosa Gorge has been closed to all vehicular traffic to protect rare, desert

wildlife. Foot traffic is permitted. The southern half of the Gorge, and its immediate environs, will continue to be an outstanding recreational area in a most unusual setting.

A short distance south lies the ruins of Sperry Station. Constructed of adobe mud, the buildings have almost melted back into the earth. Borax Smith enjoyed naming places after his relatives and friends. The station and wash were so-called in honor of his adopted niece, Grace Sperry.

An Indian Trail dating back into antiquity originally followed the Amargosa River through the Gorge. Over it came the first explorers in 1829. It was to become part of the Spanish Trail along which yearly caravans, Fremont's Expedition and emigrants traveled.

South of Sperry Station ruins, the abandoned railbed becomes the road for the next two and a half miles. In November 1974, we found the thrills were many along the way. The narrow bed rises to some 40 feet above the floor of the Gorge. A first-hand view of those ''long cuts and very long fills'' was ours to enjoy. The cuts seemed like canyons and the fills were dirt trestles which dropped almost straight down on each side.

Tecopa — the springs, resort or town — will make a good base camp for anyone planning to spend some time in the general area. Rockhounds will find several locales for collecting. There is colorful agate and jasper at the petrified wood location plus fire opal and amethyst (Desert, November 1973) in the region.

Camp can also be made at the collecting areas as well as the southern end of Amargosa Gorge. There is a County Campground at Tecopa Hot Springs (\$2.00 per night includes hot mineral baths but no hookups). Privately owned Tecopa Springs Resort offers RVee spaces with hookups, as does the trailer park in Tecopa.

Amargosa Gorge Country provides the ultimate in desert recreation. There is something for everyone be he camper, rockhound, cyclist, dune buggy enthusiast, four-wheeler, history or mining buff or one who just enjoys exploring new country. Far from metropolitan areas, this uncrowded region is not only an outstanding "Winter Fun Land" but the Great Mojave Desert at its best.

Letters to the Editor

Letters requesting answers must include stamped self-addressed envelope

Bayley House News . . .

Your cover on your July issue of DESERT Magazine was of the Bayley House at Pilot Hill, California. In your September issue, your Letters to the Editor contained a letter from Mr. Jim Crain, correcting the caption of the July cover, and at the same time mentioned that the future of the old mansion was in doubt and that no one seemed to want it.

I am enclosing a picture and article from the Sacramento Bee of August 21st, which states the following and should put many minds at ease:

"The historic Bayley House, a three-story red brick structure on Highway 49 at Pilot Hill, has been accepted as a gift by El Dorado County. Alexander & Baldwin Inc., of Honolulu had offered the 114-year-old edifice to the county in a last ditch effort to keep it in public ownership. The county supervisors accepted the offer on the condition that the county receive the house and about 10 acres clear of any deed restrictions. The Honolulu firm owns about 2000 acres around the Bayley House and plans to subdivide the property."

I am a relatively new member of the Desert Magazine family, but must tell you how much I enjoy it. But it has re-activated a World War II disease common to infantrymen, now terminal I fear, called ''Itching Feet.'' Thank you for a beautiful escape from this daily old world.

LEE WILLIAMS, Folsom, California.

More on Murals . . .

In regard to Frank W. Ellis' letter about the mysterious murals found outside of Chloride, Arizona in the September, 1975 issue of Desert, in June, 1974, my friends and I made a trip to Pierce's Ferry on the shores of Lake Mead. We have done extensive mine exploration in the Mojave and are greatly interested in ghost towns and their backgrounds.

Upon returning from Lake Mead, along Highway 62, the small sign indicating Chloride caught our eye. After driving a few miles, we reached the town which turned out to be a gem of a mining town. The first thing we noticed was the huge mine at the end of the main street. While we were looking at the old relic, a car pulled up and an old desert rat

popped out. He introduced himself as Mr. Patterson, the owner of the mine which was called the Tennessee Schuykill Mine. We chatted about the mine and the town for awhile and then he told us about the murals.

If I recall right, they were painted a while ago by someone living in the town, a local artist. If you examined the paintings carefully, you would have found that they depicted the Tennessee Schuykill Mine with all its workings intact. I think they date to the early '60s. I revisited the Chloride area in the spring of '75 and camped right next to the murals. There was no scaffolding in place at the time, but the one you saw was probably for repair work on the murals.

JOE BUTTERWORTH, Anaheim, California.

Mysterious Blue Bucket . . .

Your article on the "Blue Bucket" in August, 1975 is good, but in my mind does not refute the reasons it is worth looking for. As a treasure hunter, the first things I look for in a treasure are first-hand authenticity, researchability, factuality; and in the case of lost mines, whether the metal is found in the area.

The Blue Bucket's first-hand accounts are more numerous than any other lost mine I have researched. Documentation includes three accounts your article mentions plus material in more than 30 books. Magazines running articles on it include Desert, True Treasure, Oregon Historical Quarterly, and Overland Monthly. Newspaper articles are numerous and often confusing. If the Blue Bucket is "...a fancy rather than a historical fact" as Mr. Larsen states, it is an historically well-documented fancy.

Mr. Larsen writes "Members of the 1845 migration should have been able to determine the "yellow rocks" they found were gold," and implies no one did know what the metal wa. Yet, in one of the articles Mr. Larsen cites as a version, W. H. Herren states his father, W. J. Herren "... was quite sure it was gold at the time, (he found it) ..." (Oregonian, 3/7/22).

Geologically, two areas on the trail as reconstructed on an 1863 survey map have produced gold. Near Malheur River, the town of Eldorado was founded when the Blue Bucket was thought to have been relocated. The map shows the train got no closer to the Canyon City-John Day gold-producing area than 50-60 miles—this being over deep canyons and high mountains.

Your article seems to me a paraphrase of two sources: "The Terrible Trail," and "Lost Mines and Treasures of the Pacific Northwest." Both are excellent sources on the Blue Bucket and are well-referenced. Mr. Larsen offers no new information to me, only a personal viewpoint. I still believe the Blue Bucket the most likely of any of the thousands of lost mines in the U. S. to be found. But the desert will divulge it only under more exhaustive research than is currently being done.

DAN WHEELER, Maupin, Oregon.

Calendar of Events

NOVEMBER 1 & 2, Northrop Recreation Gem and Mineral Club's 2nd Annual Show, N.R.C. Recreation Center, 1834 W. Valencia Dr., Fullerton, Calif. Displays, Dealers, Door Prizes. Free admission and parking.

NOVEMBER 8 & 9, Gem and Mineral Show sponsored by the Montebello Mineral & Lapidary Soceity, Gardens Masonic Temple, 6310 East Olympic Blvd., East Los Angeles, Calif. Dealers, demonstrations, free admission. Chairman: Jack Davis, 3344 Lexington Ave., El Monte, Calif. 91713.

NOVEMBER 8 & 9, 15th Annual 29 Palms Gem and Mineral Show, Hayes Auditorium, Utah Trail, 29 Palms, Calif. Dealer space filled. 33rd Annual Weed & Flower Show, sponsored by 29 Palms Garden Club, same location. 18th Annual Soroptimist Smorgasbord, same location. 29 Palms Artists Guild Exhibit and Demonstration at Art Gallery, 74055 Cottonwood Dr., 29 Palms, California.

NOVEMBER 8 & 9, 19th: Annual Gem and Mineral Show, Community Center, China Lake, California. Open gate at the Naval Weapons Center, free admission for show and field trips to local areas for travertine and agate. Camping in desert or local fairgrounds.

JANUARY 18, Sylmar Gem Dandies Gem and Mineral Club "Showoff of 1976." Masonic Temple, 1112 N. Maclay, San Fernando, California. Free parking, admission and demonstrations. Food, dealers.

JANUARY 31-FEBRUARY 1, Orange Coast Mineral & Lapidary Society's 26th Annual Show, National Guard Armory, 612 E. Warner, Santa Ana, Calif. Dealer space filled. Free admission and parking. Outstanding exhibits.

FEBRUARY 13-15, Tucson Gem and Mineral Society's 22nd Annual Show, Tucson Community Center Exhibition Hall, 350 S. Church St., Tucson, Arizona. Dealer space filled. Admission \$1.00 adults, children under 14 free with adult.

FEBRUARY 22-29, Desert Botanical Garden's 29th Annual Cactus Show, Papago Park, Phoenix, Arizona. Free admission. Oldest and largest show of its kind with a striking variety of displays.

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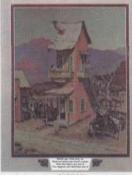
SKP510 May your moccasins leave tracks On many mounds of worth, And walk with braves of every tribe Who live in peace on earth.



May neither drouth nor rain nor blizzard Disturb the joy-juice in your gizzard.
And may you camp where wind won't hit you,
Where snakes won't bite and bears won't git you!



"There were a helluva lot of things they didn't tell me when I hired on with this outfit."



SKP516 Middle age, from forty on, Need not mean your youth is gone; Only that before you lose it, You doggone well had better use it!



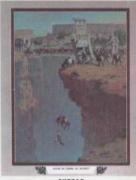
SKP509 Nothing is so strong as gentleness Nothing so gentle as real strength



May your horse never stumble, your spurs never rust May your horse never sumble, your cinch never bust May your boots never pinch, your crops never fail, While you eat lots of beans and stay out of jail!



HANG TOUGH, PARDNER!



SKP515 HANG IN THERE, OL' BUDDY!



SKP506 "BOTTOMS UP"



SKP508 To have joy one must share it, Happiness was born a twin."

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